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ANNUAL REPORT
OF
OCEANOGRAPHIC OBSERVATIONS

해 양 조 사 연 보

VOLUME 21
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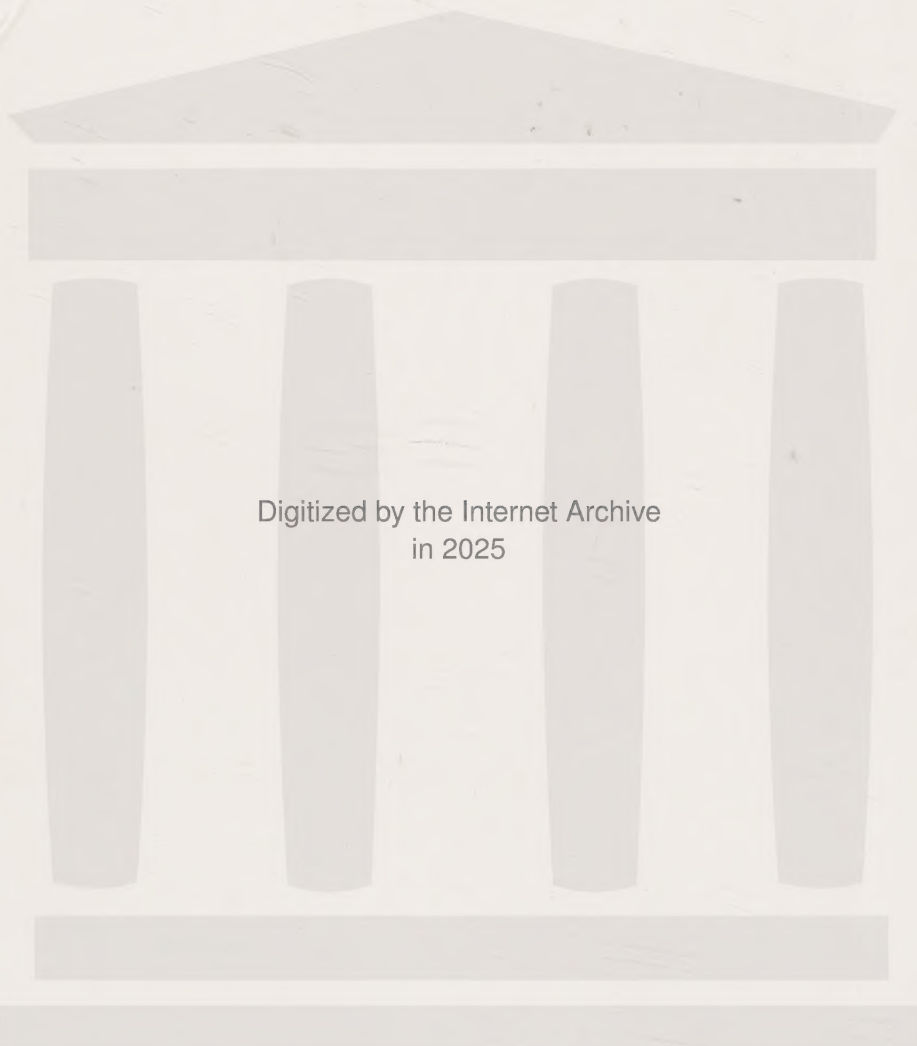
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국 립 수 산 진 흥 원

Fisheries Research and Development Agency
The Government of the Republic of Korea
Busan, Korea
August, 1973



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국 민 교 육 현 장

우리는 민족중흥의 역사적 사명을 띠고 이 땅에 태어났다. 조상의
빛난 얼을 오늘에 되살려, 안으로 자주독립의 자세를 확립하고, 밖으
로 인류공영에 이바지 할 때다. 이에, 우리의 나아갈 바를 밝혀 교육
의 지표로 삼는다.

성실한 마음과 튼튼한 몸으로, 학문과 기술을 배우고 익히며, 타고
난 저마다의 소질을 계발하고 우리의 처지를 약진의 발판으로 삼아,
창조의 힘과 개혁의 정신을 기른다. 공익과 질서를 앞세우며 능률과
실질을 숭상하고, 경애와 신의에 뿌리 박은 상부 상조의 전통을 이어
받아, 명랑하고 따뜻한 협동 정신을 북돋운다. 우리의 창의와 협력을
바탕으로 나라가 발전하며, 나라의 융성이 나의 발전의 근본임을 깨
달아, 자유와 권리에 따르는 책임과 의무를 다하며, 스스로 국가 건
설에 참여하고 봉사하는 국민 정신을 드높인다.

반공 민주 정신에 투철한 애국 애족이 우리의 삶의 길이며, 자유
세계의 이상을 실현하는 기반이다. 길이 후손에 물려줄 영광된 통일
조국의 앞날을 내다보며, 신념과 긍지를 지닌 근면한 국민으로서, 민
족의 슬기를 모아 줄기찬 노력으로, 새 역사를 창조하자.

1968년 12월 5일

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범 례

- 시 각 : 대한민국 표준시이며 동경 135° 의 자오선으로한 평균태양시.
- 수 온 : 섭씨도수 (C)이며 시도는 $\frac{1}{100}$ 까지 표시.
- 염 분 : 전기 전도도 염분계로 측정하고 천분율 (%)로 표시.
- 산 소 : 수중용존 산소량은 Winkler씨 방법에 의하여 측정하고 1기압 0C 배의 %로 표시.
- P. H : Fisher Accumet PH meter 로 측정.
- 영양염 : 분광광도계 SP-600 또는 광전비색계 (동경광전식 7A형)로서 비색법으로 정량 측정하고 $\mu\text{g-at/L}$ 로 표시
- 수 심 : Meter 법으로 표시
- 수 색 : Forol 수색 표준액의 수색번호 (1-11) 도서 표시
- 투명도 : 투명도 판에 의한 측정치로서 Meter 법으로 표시 .
- 파 랑 : 10계급 (0-9)에 의하여 눈으로 관측하여 표시
- 너 울 : 4계급 (0-3)에 의하여 눈으로 관측한 것이며 파고 0:0 m, 1:2m 미만, 2: 2-4m, 3: 4m 이상.
- 기 온 : 섭씨도수 (C)이며 시도는 1/10까지 표시.
- 기 압 : Aneroid 기압계에 의한 관측이며 mb로 표시
- 풍 향 : 풍향은 16 방위법 (자침방위)으로 관측하여 표시
- 풍 력 : 풍력은 Beaufort 풍력 계급에 의하여 눈으로 관측하여 표시
- 운 형 : 운형은 10종 운형법으로 관측하여 표시
- 운 량 : 운량은 천공의 10등분법에 의하여 눈으로 관측하여 표시
- 천 기 : 천기는 쾌청(B): 운량 0-2, 청 (BC): 운량 3-7, 흐림(C): 운량 8-10, 비(R), 안개(F), 눈(S) 등으로 구분하여 표시됨.

EXPLANATIONS

Time	;	Korean standard time used the mean solar time referred to the meridian of 135° E.
Water temperature	;	Recorded in hundredths of a degree in centigrade.
Salinity	;	Expressed in parts per thousandth, and measured by the inductively coupled Salinometer.
Oxygen	;	Concentration of dissolved Oxygen volume per liter(%) at 0°C and 760 <i>mm</i> Hg.
PH	;	Negative logarithm of the hydrogen ion concentration measured by the Fisher Accumet PH meter.
Nutrient Salts	;	Measured by Spectrophotometer SP-600 or Electrophotometer (Tokyo Photo Electric 7A) and expressed in microgram atoms per liter ($\mu\text{g-at/L}$)
Depth	;	Expressed in meters determined by the wire length and its angle or an interpolated value obtained.
Color of the sea	;	Recorded in numbers of Forel Scale(1-11)
Transparency	;	Expressed in meters determined by the Secchi disk.
Wind wave	;	Expressed in the Scale (0-9)
Swell	;	Expressed in the Scale (0-3) The numbers of the scale and the Wave height as follows. 0: 0m, 1: less than 2m, 2: 2-4m, 3: greater than 4m.

Air temperature ; Recorded in tenths of a degree in Centigrade.

Atmospheric pressure; Recorded in millimeter obtained from the direct reading of Aneroid Barometer.

Wind direction ; Given in 16 point scale of the Compass bearing.

Wind velocity ; Given in Beaufort Scale.

Cloud type ; Recorded in ten types of the cloud.

Cloud amount ; Expressed in tenths of the whole Sky covered.

Weather ; Recorded in present Weather: the abbreviations and the cloud cover are as follows, B: 0-2, BC: 3-7, C: 8-10, Rain: R, Fog: F, Snow: S

제 1 편

연안정지 해양 관측 성적



PART 1

COASTAL COEANOGRAPHIC OBSERVATIONS

1972

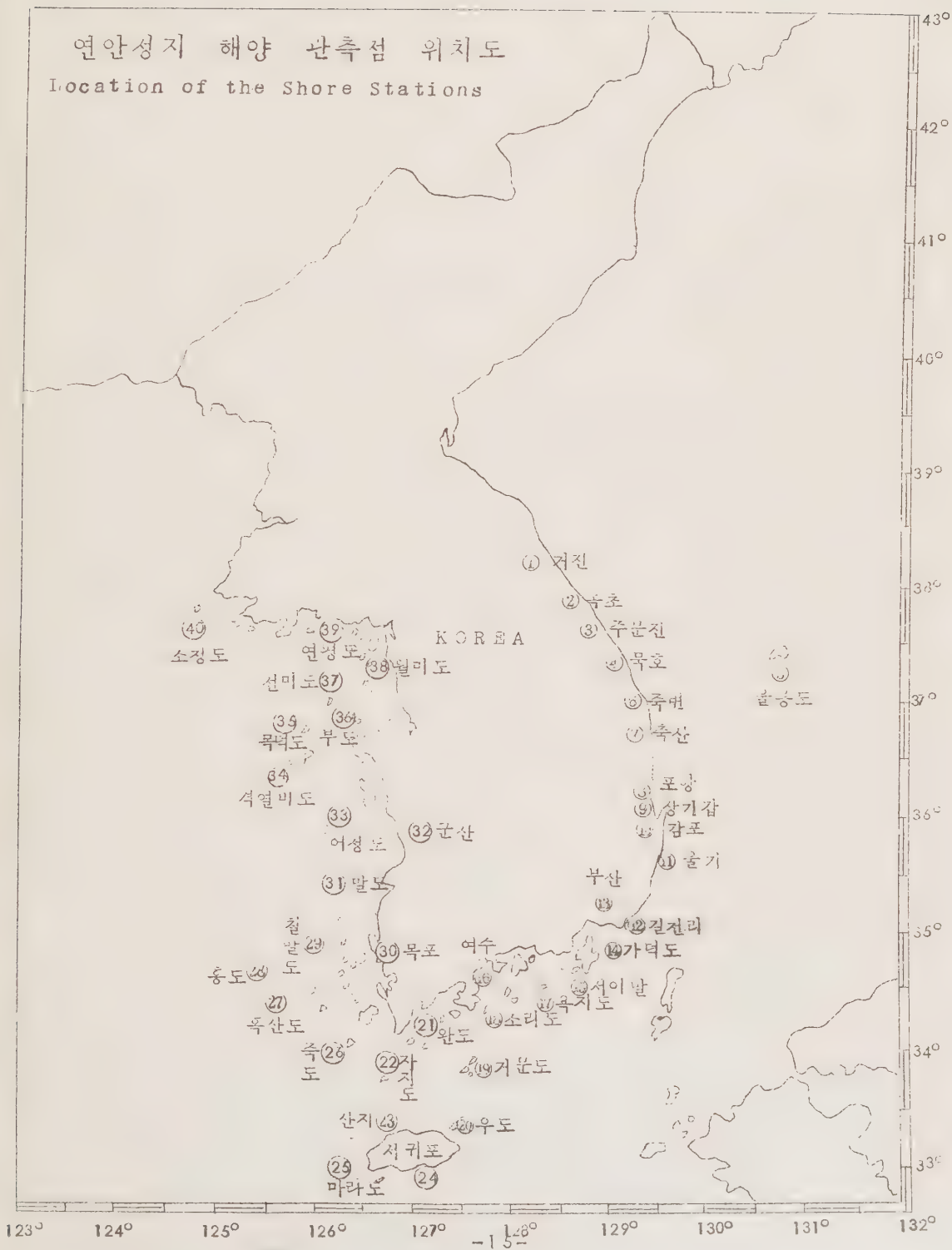
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연안성지 해양 관측점 위치도 Location of the Shore Stations



연안정지 해양관측점 위치표

Position of the Shore Stations

해역 (Region)	번호 No.	관측지명 Name of the Stations	위치 Position		관측회수 Frequency of Observation	관측개시년월 Date of Inauguration
			북 Lat. (N)	동 Long. (E)		
동해안 East Coast	1	거진 Kujin	38°28'30"	128°26'00"	매일 Daily※	1967. 4
	2	속초 Sokcho	38°12'32"	128°36'18"	매일 Daily※	1967. 4
	3	주문진 ChumunJin	37°53'15"	128°50'00"	매일 Daily※	1952. 8
	4	묵호 Mukho	37°32'58"	129°07'15"	매일 Daily※	1967. 6
	5	울릉도 Ulneung-Do	37°29'00"	130°54'35"	매일 Daily※	1931. 11
	6	죽변 Chukbyon	37°03'28"	131°26'00"	매일 Daily※	1916. 7
	7	속산 Chuksan	36°30'29"	129°27'37"	매일 Daily※	1968. 4
	8	포항 Pohang	35°02'56"	129°26'10"	매일 Daily※	1946. 7
	9	장기갑 Changgigap	35°04'35"	129°34'30"	매일 Daily※	1967. 5
	10	감포 Gampo	35°48'20"	129°30'40"	매일 Daily※	1916. 7
	11	울기 Ulgi	35°29'28"	129°26'50"	매일 Daily※	1939. 1
남해안 South Coast	12	동래길천 Dongrae Gilchun	35°19'00"	129°17'00"	매일 Daily※	1969. 1
	13	부산 Busan	35°05'08"	129°02'07"	매일 Daily※	1925. 3
	14	가덕도 Kaduk-Do	34°59'20"	128°49'50"	매일 Daily※	1930. 1
	15	서이말 Sui-mal	34°47'00"	128°44'10"	매일 Daily※	1967. 4
	16	여수 Yosu	34°44'00"	127°44'00"	매일 Daily※	1921. 1
	17	옥지도 Yokji-Do	34°40'50"	128°10'35"	매일 Daily※	1969. 1
	18	소리도 Sori-Do	34°24'15"	127°48'15"	매일 Daily※	1928. 4
	19	거문도 Kumun-Do	34°00'30"	127°19'15"	매일 Daily※	1916. 7
	20	우도 U-Do	33°29'10"	126°58'10"	매일 Daily※	1967. 4
	21	완도 Wan-Do	34°19'10"	126°45'00"	매일 Daily※	1967. 9
	22	차지도 Chaji-Do	34°05'20"	126°36'15"	매일 Daily※	1928. 4
	23	산지 Sanji	33°31'10"	126°33'00"	매일 Daily※	1923. 10
	24	서귀포 Seogwipo	33°13'30"	126°34'45"	매일 Daily※	1963. 1
	25	마라도 Mara-Do	33°06'45"	126°06'45"	매일 Daily※	1923. 10
서해안 West Coast	26	죽도 Chuk-Do	34°13'30"	125°51'00"	매일 Daily※	1916. 7
	27	흑산도 Huksan-Do	34°05'30"	125°06'50"	매일 Daily※	1925. 10
	28	홍도 Hong-Do	34°42'30"	125°13'00"	매일 Daily※	1933. 1
	29	칠발도 Chilbal-Do	34°47'25"	125°47'30"	매일 Daily※	1967. 5
	30	목포 Mokpo	34°46'40"	126°23'05"	매일 Daily※	1928. 8
	31	마도 Mai-Do	35°51'15"	126°19'10"	매일 Daily※	1967. 4
	32	군산 Kunsan	35°59'15"	126°43'00"	매일 Daily※	1939. 4
	33	이청도 Ochung-Do	36°05'40"	125°52'15"	매일 Daily※	1916. 7
	34	격일비도 Kyognyolbi-Do	36°37'15"	125°33'20"	매일 Daily※	1916. 7
	35	목덕도 Mokdok-Do	36°55'40"	125°45'30"	매일 Daily※	1967. 9
	36	부도 Bu-Do	37°08'40"	126°21'00"	매일 Daily※	1926. 1
	37	선미도 Sunmi-Do	37°17'10"	126°04'40"	매일 Daily※	1967. 7
	38	월미도 Wolmi-Do	37°28'25"	126°36'30"	매일 Daily※	1967. 4
	39	연평도 Yunpyung-Do	37°38'55"	125°41'10"	매일 Daily※	1967. 4
	40	소청도 Sochung-Do	37°45'00"	124°44'00"	매일 Daily※	1967. 5

※매일오전 10시 관측 At 10 a.m. everywhere

연안정지월별표면수온

Surface Water temperature of the Shore Stations

월 Month	관측지점 Station		①	②	③	④	⑤	⑥	⑦	⑧
	날 Ten	일 day	거진 Kujin	죽초 Sokcho	주문진 Chumunjin	묵호 Mukho	울릉도 Ulleung-Do	죽변 Chukbyon	죽산 Cnuksan	포항 Po-hang
1월 Jan.	상	순	10.71	11.57	10.98	10.84	13.12	11.26	—	11.54
	중	순	7.56	10.01	10.55	10.44	12.58	11.10	—	11.42
	하	순	3.30	5.26	6.68	8.97	12.01	11.22	—	10.82
	월	평	7.19	8.95	9.40	10.08	12.57	11.19	—	11.26
	균	Mean								
2월 Feb.	상	순	2.43	3.07	3.41	5.41	—	9.68	—	10.24
	중	순	2.19	2.46	3.23	3.46	—	9.80	—	10.20
	하	순	1.93	2.89	2.48	4.21	—	9.54	—	9.97
	월	평	2.18	2.81	3.04	4.27	—	9.67	—	10.14
	균	Mean								
3월 Mar.	상	순	2.14	2.82	2.95	6.90	—	10.30	9.90	9.28
	중	순	3.76	4.09	4.23	6.28	—	11.46	10.49	10.12
	하	순	4.66	4.95	5.97	7.14	—	10.15	12.04	11.55
	월	평	3.52	3.99	4.38	6.77	—	10.64	10.81	10.32
	균	Mean								
4월 Apr.	상	순	4.75	5.31	7.46	7.78	—	9.96	11.62	11.14
	중	순	6.50	7.07	9.78	10.85	—	12.20	11.35	12.37
	하	순	7.91	10.00	11.71	11.51	—	13.90	13.32	12.30
	월	평	6.39	7.46	9.65	10.05	—	12.02	11.76	11.94
	균	Mean								
5월 May	상	순	9.50	10.80	11.89	12.67	14.33	13.47	12.97	13.57
	중	순	11.29	12.54	13.23	13.88	14.80	14.61	15.15	14.89
	하	순	12.75	12.95	13.17	14.59	15.35	14.95	14.62	16.00
	월	평	11.18	12.10	12.76	13.71	14.83	14.34	14.25	14.82
	균	Mean								
6월 Jun.	상	순	11.73	9.87	11.51	15.09	17.72	11.11	13.60	16.89
	중	순	13.50	14.80	13.26	11.14	17.93	13.59	12.99	15.04
	하	순	17.38	17.46	18.11	13.92	18.96	13.39	14.57	16.09
	월	평	14.20	14.04	14.29	13.38	18.20	12.70	13.72	16.01
	균	Mean								
7월 Jul.	상	순	19.85	18.49	19.40	18.35	19.59	14.24	10.00	13.04
	중	순	19.98	19.57	19.74	20.28	20.74	18.36	18.63	18.14
	하	순	23.00	22.84	23.97	23.55	22.09	22.53	23.26	24.02
	월	평	20.94	20.30	21.04	20.73	20.81	18.38	17.30	18.40
	균	Mean								
8월 Aug.	상	순	23.83	23.49	23.80	23.98	22.93	21.13	19.65	20.54
	중	순	20.87	21.87	23.01	23.87	23.06	23.59	20.84	21.25
	하	순	19.45	20.43	19.79	20.52	22.94	21.03	20.47	22.05
	월	평	21.38	21.93	22.20	22.79	22.98	21.92	20.32	21.28
	균	Mean								
9월 Sep.	상	순	19.98	20.12	20.33	21.13	22.79	19.05	22.12	21.26
	중	순	18.22	19.56	20.36	21.46	22.18	21.83	22.40	21.63
	하	순	19.24	17.86	19.19	19.82	21.04	22.02	20.89	21.42
	월	평	19.15	19.18	19.96	20.80	22.00	20.97	21.80	21.44
	균	Mean								
10월 Oct.	상	순	12.67	17.41	18.44	19.37	19.65	19.50	20.46	20.21
	중	순	17.15	12.58	17.40	18.66	19.97	18.05	18.61	18.27
	하	순	15.35	13.44	16.08	16.86	18.97	16.36	18.30	16.30
	월	평	16.72	14.48	17.31	18.30	19.53	17.97	19.12	18.26
	균	Mean								
11월 Nov.	상	순	13.66	13.58	14.31	14.71	18.25	14.50	15.11	14.76
	중	순	12.23	11.67	13.60	14.07	17.46	14.15	15.23	14.82
	하	순	8.66	9.03	11.76	11.12	15.71	11.35	12.48	10.10
	월	평	11.52	11.43	13.22	13.30	17.14	13.33	14.29	13.23
	균	Mean								
12월 Dec.	상	순	8.22	7.94	10.91	10.84	14.17	10.80	11.99	9.59
	중	순	6.64	7.18	8.13	10.62	12.84	11.15	9.47	8.46
	하	순	5.01	3.71	7.91	10.90	12.14	10.86	9.31	9.88
	월	평	6.62	6.28	8.98	10.79	13.05	10.94	10.26	9.31
	균	Mean								
년 Year	년	평	11.75	11.91	13.02	13.75	17.90	14.51	15.36	14.70
균	균	Mean								

⑨ 장 기 감 Changgigap	⑩ 감 포 Gampo	⑪ 울 기 Ulgi	⑫ 동래길천 Dongrae Gil Chun	⑬ 부 산 Busan	⑭ 가 덕 도 Kadok-Do	⑮ 서 이 말 Sui-mal	⑯ 여 수 Yosu	⑰ 육 지 도 YokJi-Do
11.25	13.23	13.66	10.38	12.40	11.37	13.85	7.11	10.62
12.44	13.90	13.88	11.10	13.51	12.36	14.00	7.39	10.27
12.57	14.18	13.16	10.32	12.56	11.24	12.95	7.30	10.97
12.09	13.77	13.57	10.60	12.82	11.66	13.60	7.27	10.62
12.08	12.01	13.82	11.35	12.13	10.30	12.55	7.12	11.46
11.83	11.39	12.95	11.27	13.00	10.50	12.42	7.47	11.43
7.00	11.32	12.69	10.85	10.42	10.49	12.03	7.19	11.36
10.30	11.57	13.15	11.16	11.85	10.43	12.33	7.26	11.42
7.10	11.75	12.74	11.32	11.16	10.22	11.65	7.17	11.37
9.45	12.14	12.40	11.69	12.23	10.92	12.10	8.47	12.01
11.82	12.62	13.03	11.91	13.00	11.84	12.30	10.34	12.72
9.46	12.17	12.72	11.64	12.13	10.99	12.02	8.66	12.03
11.85	12.17	12.73	12.95	12.14	11.33	12.18	11.08	12.66
13.58	13.17	13.64	14.15	13.50	13.04	12.79	12.84	13.53
14.88	14.35	14.06	14.07	13.86	13.93	13.76	14.39	14.15
13.44	13.23	13.48	13.72	13.17	12.77	12.91	12.77	13.45
15.51	14.22	14.62	14.93	15.04	15.38	14.92	15.59	14.82
16.80	15.78	15.27	15.62	15.67	16.02	15.64	15.94	14.91
17.34	16.30	15.75	16.02	16.00	16.16	15.80	16.75	15.99
16.55	15.43	15.21	15.52	15.57	15.85	15.45	16.09	15.24
18.41	16.85	16.40	19.00	17.33	17.41	16.60	18.27	17.56
19.71	16.73	16.48	18.99	17.59	18.10	17.48	19.74	18.61
19.25	19.21	17.24	18.71	18.63	18.69	17.52	20.45	19.59
19.12	17.60	16.71	18.90	17.85	18.07	17.20	19.49	18.59
18.90	10.70	14.65	19.11	19.18	19.71	17.25	21.98	19.95
17.55	17.05	17.65	19.80	19.63	20.48	19.51	21.06	21.09
23.59	25.40	21.33	19.40	23.43	23.30	22.34	24.05	23.99
20.01	17.72	17.88	19.44	20.75	21.16	19.70	22.36	21.68
24.54	18.71	16.86	19.49	23.75	24.39	23.50	25.37	25.15
22.15	19.10	15.78	19.11	22.05	22.96	21.99	24.40	24.58
22.10	21.97	21.46	19.35	22.57	22.68	21.26	22.99	22.88
22.93	19.93	18.03	19.32	22.79	23.34	22.25	24.25	24.20
22.35	21.73	20.60	21.58	21.90	21.75	20.92	21.98	22.92
21.09	23.54	21.47	23.05	22.56	21.99	22.18	21.95	23.24
18.95	22.12	21.25	22.90	20.69	20.71	20.91	21.33	22.21
20.80	22.46	21.11	22.51	21.72	21.48	21.34	21.75	22.79
19.33	20.02	18.45	19.07	19.40	—	19.02	19.91	21.37
17.93	18.80	17.85	18.82	17.59	—	17.48	18.74	20.85
14.94	16.76	16.79	17.77	15.83	—	15.70	17.60	19.80
17.40	18.53	17.70	18.55	17.61	—	17.40	18.75	20.67
13.20	16.21	15.03	—	15.53	14.96	12.69	16.29	15.62
12.44	16.27	15.67	—	15.22	15.20	14.59	15.19	14.91
9.00	12.88	13.23	—	12.50	13.87	12.89	11.92	14.60
11.55	15.12	14.64	—	14.45	14.68	13.39	14.47	15.04
8.62	13.29	13.09	12.08	13.13	12.68	12.57	10.09	12.76
12.19	13.29	13.35	11.08	11.33	12.09	12.47	8.65	11.29
8.96	13.08	12.59	11.06	11.82	12.19	12.74	7.96	10.98
9.92	13.22	13.01	11.41	12.09	12.32	12.59	8.90	11.68
15.28	15.89	15.60	15.71	16.07	15.70	15.85	15.17	16.45

월 Month	관측지점 Station		⑬ 소리도 Sori-Do	⑭ 거문도 Kum-in-Do	⑮ 우도 U-Do	⑯ 완도 Wan-Do	⑰ 자지도 Chaji-Do	⑱ 산지 Sanji	㉔ 서귀포 Seogwipo	㉕ 마라도 Mara-Do
	순 Ten	day								
1월 Jan.	상	순 1st	12.20	7.72	15.15	4.50	10.40	15.30	16.38	16.81
	중	순 2nd	12.67	10.54	15.76	6.00	10.79	14.53	15.81	14.95
	하	순 3rd	11.91	5.95	15.78	8.93	9.22	14.61	15.24	15.89
	월평균	Mean	12.26	8.07	15.57	6.48	10.14	14.81	15.81	15.88
2월 Feb.	상	순 1st	11.18	12.98	15.84	7.11	10.19	13.78	15.10	14.59
	중	순 2nd	11.49	12.64	14.89	7.24	9.34	13.54	14.75	14.33
	하	순 3rd	9.12	12.72	14.29	7.61	9.89	13.12	14.43	14.22
	월평균	Mean	10.86	12.78	15.01	7.12	9.97	13.48	14.76	14.38
3월 Mar.	상	순 1st	9.77	12.73	14.28	8.30	10.33	11.99	14.55	14.43
	중	순 2nd	10.27	13.06	13.76	9.69	10.37	13.36	14.94	14.35
	하	순 3rd	11.58	13.25	12.95	11.52	11.44	14.49	15.11	14.80
	월평균	Mean	10.54	13.01	14.00	9.84	8.15	13.28	14.87	14.53
4월 Apr.	상	순 1st	11.22	12.42	14.24	11.56	11.57	13.79	15.23	14.99
	중	순 2nd	13.54	13.93	14.47	13.32	12.67	14.98	15.69	15.25
	하	순 3rd	14.33	13.74	13.49	13.47	13.42	15.69	16.09	16.42
	월평균	Mean	13.03	13.73	14.73	13.12	12.55	14.78	15.67	15.55
5월 May	상	순 1st	15.34	14.21	16.11	16.13	13.91	16.58	15.82	16.54
	중	순 2nd	15.57	14.60	15.98	15.38	15.22	16.44	17.06	16.23
	하	순 3rd	16.20	14.13	17.45	17.17	16.20	17.74	17.35	17.02
	월평균	Mean	15.71	14.60	17.81	16.41	15.11	16.59	17.03	16.60
6월 Jun.	상	순 1st	17.56	14.49	19.29	17.69	14.11	17.56	17.64	17.69
	중	순 2nd	19.17	17.14	19.14	22.11	15.11	18.72	17.49	20.56
	하	순 3rd	20.57	17.81	19.12	22.22	15.11	19.47	20.17	21.35
	월평균	Mean	19.10	17.38	19.55	21.53	16.50	18.58	19.43	20.53
7월 Jul.	상	순 1st	20.78	17.92	19.30	22.26	17.29	20.60	20.76	22.11
	중	순 2nd	22.26	21.31	20.93	23.05	18.42	21.56	21.79	22.92
	하	순 3rd	26.20	21.26	21.29	25.53	19.19	24.97	22.89	23.12
	월평균	Mean	23.08	21.26	20.84	23.56	18.23	21.72	21.88	22.71
8월 Aug.	상	순 1st	27.23	25.01	21.75	27.11	17.16	24.15	24.91	25.09
	중	순 2nd	25.03	24.07	21.88	26.69	17.28	24.49	24.11	26.36
	하	순 3rd	29.36	24.42	21.65	27.11	17.51	24.17	24.11	25.19
	월평균	Mean	24.87	24.50	21.69	26.31	17.77	24.41	24.67	25.79
9월 Sep.	상	순 1st	22.69	23.59	23.74	22.49	20.45	24.22	25.15	24.11
	중	순 2nd	22.78	23.64	23.39	22.58	20.45	24.44	25.10	24.11
	하	순 3rd	21.13	23.21	22.16	21.05	20.11	24.14	24.11	24.11
	월평균	Mean	22.20	23.51	23.47	22.04	20.74	24.35	24.39	24.36
10월 Oct.	상	순 1st	19.63	18.79	20.72	17.11	17.12	17.59	20.19	21.11
	중	순 2nd	18.09	19.39	20.38	17.13	17.11	17.11	20.11	21.11
	하	순 3rd	16.21	17.31	19.27	17.27	16.11	17.11	17.11	21.11
	월평균	Mean	18.23	19.49	20.12	17.04	17.21	17.25	20.46	21.13
11월 Nov.	상	순 1st	15.65	17.25	17.67	17.12	16.13	17.11	19.11	17.16
	중	순 2nd	15.14	17.13	17.67	17.11	16.11	17.11	19.11	17.16
	하	순 3rd	14.11	17.11	17.11	17.11	16.11	17.11	19.11	17.16
	월평균	Mean	14.97	17.45	17.49	17.18	16.16	17.16	19.12	17.07
12월 Dec.	상	순 1st	11.43	14.75	18.63	17.07	12.22	15.16	17.11	15.21
	중	순 2nd	11.73	14.58	18.76	17.44	11.18	14.11	17.11	15.21
	하	순 3rd	12.01	14.45	18.81	17.11	11.18	14.11	17.11	15.21
	월평균	Mean	11.72	14.26	18.68	17.55	11.53	14.59	17.02	15.27
년 Year	년	평	16.38	16.46	18.27	15.85	14.60	17.62	18.74	18.73

②⑥ 죽 도 Chuk-Do	②⑦ 흑 산 도 Huksan-Do	②⑧ 홍 도 Hong-Do	②⑨ 칠 발 도 Chilbal-Do	③① 목 포 Mokpo	③① 말 도 Mal-Do	③② 군 Kunsan	③③ 어 청 도 Ochung-Do	③④ 경 일 비 도 Kyognyolbi-Do
10.65	11.20	—	8.89	6.10	5.96	3.85	8.57	5.38
11.20	10.68	—	8.64	7.37	6.17	5.07	8.18	5.16
10.70	11.09	—	8.32	7.25	6.14	3.72	7.30	4.77
10.85	10.99	—	8.62	6.91	6.00	4.21	8.01	5.10
11.19	11.43	—	8.58	6.39	5.36	3.67	6.62	4.31
11.20	11.63	—	8.86	6.37	4.94	4.30	6.15	4.39
11.33	11.92	—	8.73	5.57	4.44	3.34	5.18	3.94
11.24	11.66	—	8.76	6.11	4.91	3.77	5.98	4.21
11.45	11.93	8.92	8.28	4.85	4.10	4.10	4.73	3.56
11.39	9.24	8.09	8.58	6.54	4.63	6.62	5.06	3.40
11.22	10.28	9.20	8.26	9.05	5.66	10.13	5.95	3.79
11.35	10.48	8.74	8.37	6.81	4.80	6.95	5.25	3.58
10.92	10.40	8.23	9.38	9.77	6.23	9.35	5.56	4.07
10.78	10.75	9.05	9.16	11.15	7.34	12.46	6.76	4.74
10.89	11.79	10.41	8.88	13.26	9.17	16.29	8.12	5.37
10.86	10.98	9.23	9.14	11.39	7.58	12.70	6.81	4.73
12.23	13.02	11.00	9.28	15.25	8.68	17.24	8.80	6.26
13.27	14.98	11.56	9.08	16.87	11.09	18.40	9.65	7.55
13.30	14.24	12.63	8.97	16.81	12.42	17.98	11.17	9.49
12.93	14.08	11.73	9.11	16.31	10.73	17.87	9.87	7.77
14.34	14.80	13.30	11.29	18.18	13.47	20.47	12.58	11.74
15.06	16.24	14.90	12.40	19.86	15.35	22.54	15.10	15.07
16.17	17.03	16.78	14.43	20.99	17.30	23.30	16.85	16.11
15.19	16.02	14.99	12.71	19.68	15.37	22.10	14.84	14.31
16.34	17.20	17.90	17.10	22.46	17.12	24.32	17.90	18.31
17.48	18.79	18.87	18.03	22.34	19.06	23.29	17.80	21.53
17.14	21.75	20.96	19.26	23.98	20.15	26.85	19.80	21.19
16.99	19.25	19.24	18.13	22.93	18.78	24.82	18.50	20.34
19.79	22.96	24.16	21.13	25.27	21.85	26.70	19.69	21.46
22.33	24.25	24.02	24.09	25.91	28.09	27.10	22.86	22.48
22.07	24.88	23.13	24.15	25.01	24.65	25.02	23.68	23.92
21.40	24.03	23.77	23.12	25.40	24.86	26.27	22.08	22.62
21.41	24.45	21.60	22.63	23.36	23.34	22.12	22.08	—
20.10	22.86	18.92	21.18	22.87	21.93	23.03	21.90	—
19.62	21.82	20.76	20.13	21.66	20.68	21.41	20.39	—
20.38	23.04	20.43	21.31	22.63	21.98	22.19	21.46	—
18.56	19.28	19.13	19.90	19.52	19.86	18.32	19.58	19.32
17.41	15.52	17.00	19.57	18.99	18.63	17.74	18.45	18.90
16.11	12.36	15.71	17.39	18.08	17.74	15.76	17.15	17.07
17.36	15.72	17.28	18.95	18.86	18.74	17.27	18.39	18.43
15.77	14.33	14.93	16.42	15.93	16.79	13.25	15.85	16.38
14.79	14.46	14.74	15.60	14.55	15.12	12.07	15.08	13.95
14.44	10.68	12.59	13.34	11.08	8.26	6.62	13.09	10.69
15.00	13.16	14.13	15.12	13.85	13.39	10.65	14.67	13.67
—	12.18	12.19	—	8.62	5.49	4.80	11.51	9.35
—	11.74	10.97	—	7.82	5.57	4.00	10.28	8.51
—	11.99	10.28	—	7.75	6.21	4.30	9.19	8.02
—	11.97	11.15	—	8.06	5.76	4.37	10.33	8.63
14.87	15.12	15.07	13.94	14.91	12.74	14.43	13.02	11.22

월 Month	관측지점 Station		목  덕도 Mokduk-Do	부  도 Bu-Do	선  미도 Sunmi-Do	월  비도 Wolmi-Do	인  평도 Yunpyung-Do	소  지도 Socheong-Do
	순 Tenday							
1 월 Jan.	상	순 1st	6.15	9.25	5.06	3.74	2.22	5.87
	중	순 2nd	6.04	9.19	6.26	4.89	4.35	5.77
	하	순 3rd	5.31	10.91	5.17	4.05	4.04	4.17
	월평균	Mean	5.83	9.78	5.50	4.23	3.54	5.27
2 월 Feb.	상	순 1st	4.59	4.69	4.59	3.10	2.24	4.42
	중	순 2nd	4.42	4.41	4.46	3.69	3.70	4.36
	하	순 3rd	4.23	4.02	4.11	3.44	2.61	4.03
	월평균	Mean	4.41	4.52	4.39	3.41	2.85	4.27
3 월 Mar.	상	순 1st	3.75	—	3.69	3.16	3.56	4.25
	중	순 2nd	3.78	—	4.56	4.22	4.09	5.07
	하	순 3rd	4.85	—	5.11	6.91	5.84	5.60
	월평균	Mean	4.13	—	4.45	4.71	4.50	4.97
4 월 Apr.	상	순 1st	5.85	5.50	5.66	7.04	7.45	5.85
	중	순 2nd	6.41	6.70	6.96	8.77	8.79	6.12
	하	순 3rd	7.99	7.75	8.25	11.21	9.62	7.34
	월평균	Mean	6.75	6.65	6.96	9.01	8.62	6.44
5 월 May	상	순 1st	9.33	9.37	9.65	12.76	12.72	8.27
	중	순 2nd	10.09	10.61	11.22	14.22	14.12	9.48
	하	순 3rd	11.74	11.63	12.69	15.95	16.29	10.05
	월평균	Mean	10.39	10.54	11.19	14.31	14.38	9.27
6 월 Jun.	상	순 1st	13.11	13.10	14.14	18.39	18.01	11.86
	중	순 2nd	14.23	14.76	15.60	19.82	20.43	12.88
	하	순 3rd	15.54	16.50	16.75	20.98	22.39	15.13
	월평균		14.29	14.79	15.50	19.73	20.28	13.29
7 월 Jul.	상	순 1st	16.41	17.34	17.67	22.18	22.54	16.64
	중	순 2nd	17.63	18.76	19.04	23.13	22.80	16.09
	하	순 3rd	18.20	21.76	21.07	24.94	23.65	18.52
	월평균	Mean	17.41	19.29	19.26	23.42	23.00	17.08
8 월 Aug.	상	순 1st	19.15	23.10	21.52	25.40	22.75	18.59
	중	순 2nd	21.49	23.29	22.36	24.91	22.75	17.87
	하	순 3rd	22.29	22.58	22.05	24.08	23.05	19.55
	월평균	Mean	20.98	22.99	21.98	24.80	22.85	18.67
9 월 Sep.	상	순 1st	21.67	22.05	21.95	22.38	21.43	18.81
	중	순 2nd	21.82	22.06	21.68	22.69	19.77	19.67
	하	순 3rd	20.65	21.68	20.76	21.00	19.22	16.51
	월평균		21.38	21.93	21.46	22.02	20.14	18.33
10월 Oct.	상	순 1st	20.12	20.75	19.69	19.00	17.98	15.42
	중	순 2nd	18.62	17.91	18.63	18.17	16.62	13.92
	하	순 3rd	16.94	15.90	16.94	15.83	14.27	13.12
	월평균	Mean	18.56	18.19	18.42	17.67	16.29	14.15
11월 Nov.	상	순 1st	15.77	15.08	16.06	14.28	12.90	12.70
	중	순 2nd	14.64	14.09	14.93	13.37	11.55	12.20
	하	순 3rd	12.05	11.66	11.30	8.59	6.60	9.87
	월평균	Mean	14.15	13.61	14.10	12.08	10.35	11.59
12월 Dec.	상	순 1st	8.96	10.98	8.05	6.91	3.66	9.35
	중	순 2nd	7.76	7.96	7.56	5.37	2.76	8.35
	하	순 3rd	7.02	6.59	6.25	5.02	2.24	8.30
	월평균	Mean	7.91	8.51	7.29	5.77	2.89	8.67
년 Year	년 평 균		12.18	13.71	12.54	13.43	12.47	11.00

제 2 편

횡단정선 해양 관측 성적

(수온. 염분. 산소. 인산염. 질산염. 규산염. PH 및
기상관측 자료)



PART 2

SECTIONAL COEANOGRAPHIC OBSERVATIONS

(Temperature, Salinity, Oxygen, Phosphate-P, Nitrite-N,
Silicate-Si, PH and Meteorological Data)

1 9 7 2

차 례

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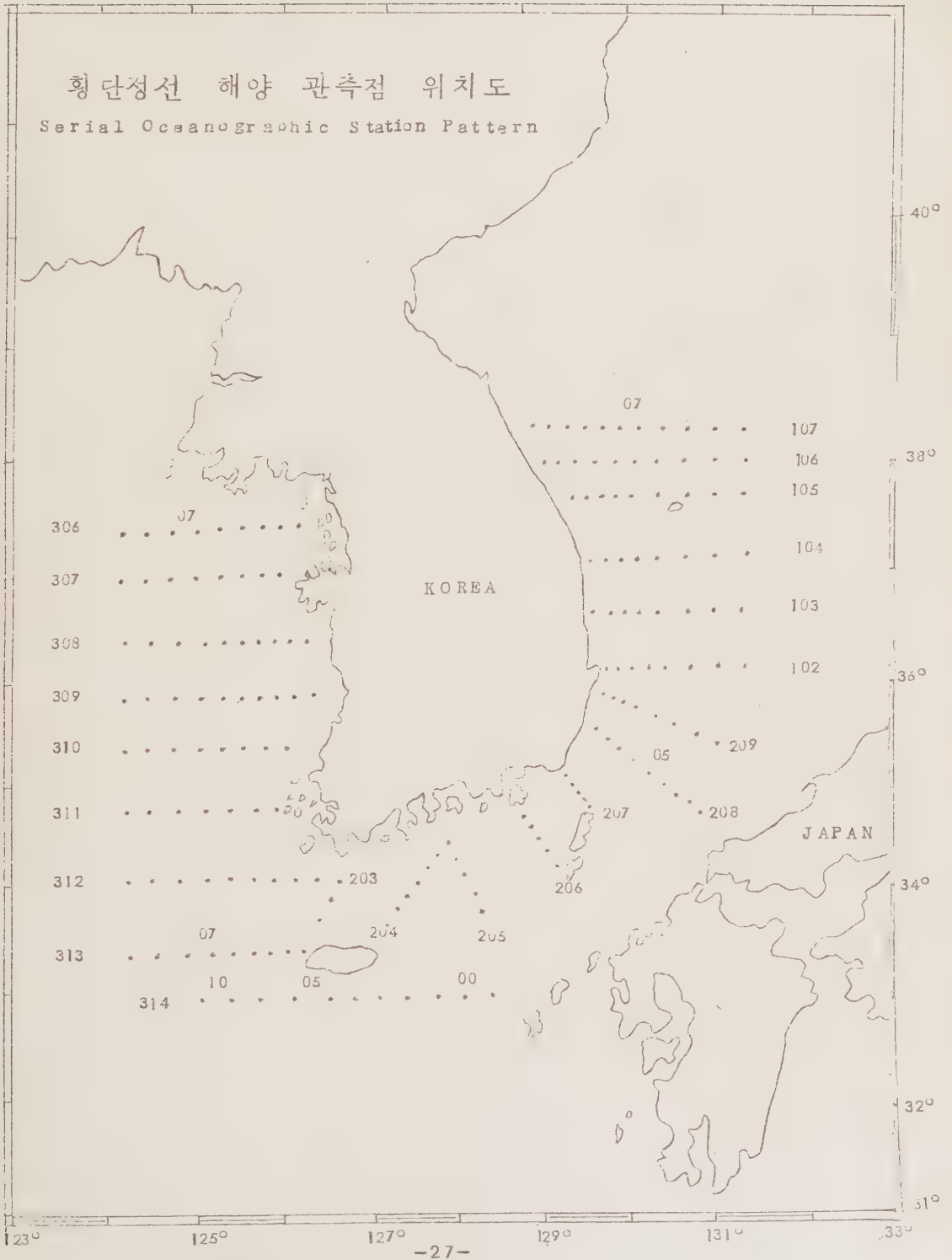
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횡단정선 해양 관측점 위치도

Serial Oceanographic Station Pattern



횡단 정선 해양 관측점 위치 표
Position of the Serial Oceanographic Stations

St. No. Line	00	01	02	03	04	05
107	38° 12.6' 128° 37.4'	38° 12.6' 128° 42.7'	38° 12.6' 128° 50.6'	38° 12.6' 129° 03.5'	38° 12.6' 129° 22.3'	38° 12.6' 129° 22.3'
106		37° 53.7' 128° 52.5'	37° 53.7' 128° 57.2'	37° 53.7' 129° 03.8'	37° 53.7' 129° 22.1'	37° 53.7' 129° 22.1'
105			37° 33.2' 129° 10.3'	37° 33.2' 129° 15.5'	37° 33.2' 129° 22.6'	37° 33.2' 129° 22.6'
104				37° 03.4' 129° 28.8'	37° 03.4' 129° 33.6'	37° 03.4' 129° 33.6'
103				36° 30.3' 129° 30.1'	36° 30.3' 129° 35.4'	36° 30.3' 129° 35.4'
102				36° 04.6' 129° 36.9'	36° 04.6' 129° 41.3'	36° 04.6' 129° 41.3'
209				35° 47.3' 129° 32.8'	35° 45.4' 129° 38.4'	35° 45.4' 129° 38.4'
208	35° 28.5' 129° 27.3'	35° 24.3' 129° 33.8'	35° 17.8' 129° 42.9'	35° 11.1' 129° 52.7'	35° 04.8' 130° 02.0'	35° 04.8' 130° 02.0'
207	35° 01.3' 129° 07.2'	34° 57.6' 129° 11.2'	34° 53.9' 129° 15.4'	34° 50.2' 129° 19.5'	34° 48.0' 129° 21.8'	34° 48.0' 129° 21.8'
206	34° 35.5' 128° 34.5'	34° 29.6' 128° 41.2'	34° 22.4' 128° 49.7'	34° 15.3' 128° 58.0'	34° 08.1' 129° 06.3'	34° 08.1' 129° 06.3'
205	34° 22.3' 127° 48.5'	34° 15.0' 127° 52.1'	34° 05.5' 127° 56.9'	33° 51.5' 128° 03.0'	33° 37.3' 128° 09.2'	33° 37.3' 128° 09.2'
204	34° 20.8' 127° 43.9'	34° 13.7' 127° 35.4'	34° 06.7' 127° 26.8'	33° 54.1' 127° 15.2'	33° 45.5' 127° 09.2'	33° 45.5' 127° 09.2'
203	33° 56.6' 126° 31.4'	33° 47.5' 126° 26.3'	33° 38.3' 126° 21.3'			
314	33° 00.0' 128° 00.6'	33° 00.0' 127° 42.0'	33° 00.0' 127° 24.0'	33° 00.0' 127° 06.0'	33° 00.0' 126° 48.0'	33° 00.0' 126° 30.0'
313		33° 24.4' 126° 00.0'	33° 24.4' 125° 48.0'	33° 24.4' 125° 36.0'	33° 24.4' 125° 24.0'	33° 24.4' 125° 24.0'
312		33° 58.5' 126° 26.0'	33° 59.8' 125° 54.0'	34° 01.3' 125° 42.0'	34° 02.6' 125° 30.0'	34° 02.6' 125° 30.0'
311				34° 43.0' 125° 43.9'	34° 43.0' 125° 31.9'	34° 43.0' 125° 31.9'
310			35° 20.0' 125° 49.3'	35° 20.1' 125° 36.5'	35° 20.1' 125° 24.4'	35° 20.1' 125° 24.4'
309	35° 51.3' 126° 14.7'	35° 51.3' 126° 02.0'	35° 51.3' 125° 49.3'	35° 51.3' 125° 37.0'	35° 51.3' 125° 24.4'	35° 51.3' 125° 24.4'
308	36° 19.8' 126° 14.4'	36° 19.8' 126° 02.3'	36° 19.8' 125° 50.0'	36° 19.8' 125° 37.0'	36° 19.8' 125° 25.3'	36° 19.8' 125° 25.3'
307			36° 56.5' 126° 00.0'	36° 55.5' 125° 37.7'	36° 55.5' 125° 25.0'	36° 55.5' 125° 25.0'
306		37° 16.9' 126° 03.1'	37° 16.9' 125° 50.3'	37° 16.9' 125° 37.8'	37° 16.9' 125° 25.2'	37° 16.9' 125° 25.2'

0 6	0 7	0 8	0 9	1 0	1 1
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38° 12.6'	33° 12.6'	38° 12.6'	33° 12.6'	38° 12.6'	33° 12.6'
129° 41.4'	130° 00.0'	130° 18.9'	130° 37.9'	130° 56.6'	131° 15.2'
37° 53.7'	37° 53.7'	37° 53.7'	37° 53.7'	37° 53.7'	37° 53.7'
129° 41.3'	130° 00.0'	130° 18.9'	130° 37.7'	130° 56.5'	131° 15.1'
37° 33.2'	37° 33.2'	37° 33.2'	37° 33.2'	37° 33.2'	37° 33.2'
129° 41.3'	130° 00.0'	130° 18.7'	130° 37.5'	130° 55.9'	131° 14.6'
37° 03.4'	37° 03.4'	37° 03.4'	37° 03.4'	37° 03.4'	37° 03.4'
129° 47.6'	130° 00.0'	130° 18.7'	130° 37.6'	130° 56.4'	131° 15.3'
36° 30.3'	36° 30.3'	36° 30.3'	36° 30.3'	36° 30.3'	36° 30.3'
129° 47.3'	130° 00.0'	130° 18.6'	130° 37.3'	130° 55.6'	131° 14.0'
36° 04.6'	36° 04.6'	36° 04.6'	36° 04.6'	36° 04.6'	36° 04.6'
129° 42.8'	130° 00.0'	130° 18.4'	130° 36.9'	130° 55.1'	131° 13.6'
35° 41.3'	35° 36.8'	35° 30.8'	35° 24.4'	35° 17.8'	35° 11.4'
129° 49.0'	130° 00.3'	130° 16.9'	130° 33.5'	130° 50.0'	131° 06.6'
34° 58.2'	34° 52.6'	34° 45.3'	34° 38.9'		
130° 11.9'	130° 20.9'	130° 30.6'	130° 40.5'		

33° 35.6'
128° 03.2'

33° 00.0'	33° 00.0'	33° 00.0'	33° 00.0'	33° 00.0'
126° 12.0'	125° 54.0'	125° 36.0'	125° 18.0'	125° 00.0'
33° 24.4'	33° 24.4'	33° 24.4'	33° 24.4'	33° 24.4'
125° 12.0'	125° 00.0'	124° 48.0'	124° 36.0'	124° 24.0'
34° 04.1'	34° 05.5'	34° 05.5'	34° 05.5'	34° 05.5'
125° 18.0'	125° 00.0'	124° 48.0'	124° 36.0'	124° 24.0'
34° 43.0'	34° 43.0'	34° 43.0'	34° 43.0'	34° 43.0'
125° 19.4'	125° 00.0'	124° 47.9'	124° 35.8'	124° 23.4'
35° 20.1'	35° 20.1'	35° 20.1'	35° 20.1'	35° 20.1'
125° 12.1'	125° 00.0'	124° 47.9'	124° 35.6'	124° 23.5'
35° 51.3'	35° 51.3'	35° 51.3'	35° 51.3'	35° 51.3'
125° 12.3'	125° 00.0'	124° 47.8'	124° 35.1'	124° 22.8'
36° 19.8'	36° 19.8'	36° 19.8'	36° 19.8'	36° 19.8'
125° 12.4'	125° 00.0'	124° 47.5'	124° 35.1'	124° 23.0'
36° 55.5'	36° 55.5'	36° 55.5'	36° 55.5'	36° 55.5'
125° 12.5'	125° 00.0'	124° 47.5'	124° 34.8'	124° 22.3'
37° 16.9'	37° 16.9'	37° 16.9'	37° 16.9'	37° 16.9'
125° 12.7'	125° 00.0'	124° 47.4'	124° 34.8'	124° 22.3'

동 해 해 양 조 사 성 적

OCEANOGRAPHIC OBSERVATIONS
EASTERN WATERS

1 9 7 2

107 선 해 양 관 측 성 적

OCEANOGRAPHIC DATA, LINE 107

2월 (February)

조사선 지리산 (Chi Ri San)

St.No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
01	12	10:10		4	13	1	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
NW	2	1030.5	4.5		As	8	C				
Z	T	S	O ₂	PO ₄ - P	NO ₂ - N	Z	T	S	O ₂	PO ₄ - P	NO ₂ - N
m	°C	‰	‰	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L
0	2.98	34.15	7.38	1.04	0.24	30	2.61	33.96	7.64	-	-
0	2.53	33.95	7.69	0.64	0.30	50	2.45	33.95	6.68	0.71	0.53
20	2.56	33.80	7.69	-	-						

St. No.		Date	Time	Depth	Water Color.	Water Trans.		Wave	Swell		
02		12	11:00		4	14		2	2		
Wind			Baro.	Air Temp.		Cloud			Weather		
Direction		Force		Dry	Wet	Type		Amount			
NW		2	1030.5	5.0		As		8	C		
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N
m	°C	‰	‰	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L
0	3.40	33.93	7.38	1.08	0.30	125	1.87	-	-	0.75	0.31
10	3.32	33.93	-	-	-	150	1.40	-	-	-	-
20	2.85	33.98	7.64	-	-	200	0.80	34.36	6.68	1.02	0.18
30	2.70	33.98	7.33	0.66	0.26	250	0.78	34.36	6.77	1.05	0.18
50	3.06	34.31	7.19	0.84	0.22	300	0.57	34.34	6.64	1.04	0.14
75	2.90	33.36	6.85	0.78	0.24	400	0.49	34.38	6.74	1.13	0.12
100	-	-	-	-	-	500	0.49	34.38	5.27	1.53	0.19

St.No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
03	12	12:50		4	14	2	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
NW	2	1030.5	5.3		As	8	C				
Z m	T C	S ‰	O ₂ ‰	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T C	S ‰	O ₂ ‰	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	3.60	34.02	7.63	0.71	0.14	125	2.30	34.47	5.80	1.13	0.16
10	3.35	33.96	6.68	0.69	0.18	150	1.18	34.47	6.74	0.92	0.10
20	3.30	33.96	7.62	1.34	0.18	200	0.97	34.33	6.65	0.95	0.14
30	2.70	33.96	7.48	-	-	250	0.70	34.24	7.10	1.04	0.12
50	2.56	34.00	7.43	0.62	0.24	300	0.62	34.56	6.82	0.67	0.26
75	2.50	34.29	6.91	1.04	0.07	400	0.47	34.56	6.69	1.04	0.14
100	2.49	34.51	6.87	0.82	0.26	500	0.39	34.38	7.34	1.08	0.08

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
04	12	14:10		4	15	3	2				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
SE	3	1030.0	5.0		As	8	C				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	3.69	34.00	7.52	0.69	0.34	125	2.34	34.27	-	0.76	0.24
10	3.60	34.00	7.38	0.63	0.18	150	1.53	34.29	-	0.93	0.18
20	3.50	34.20	7.69	0.42	0.19	200	0.77	34.31	-	0.95	0.20
30	3.50	34.07	7.48	0.42	0.20	250	0.56	34.36	-	1.05	0.14
50	3.28	34.02	7.48	0.63	0.19	300	0.47	34.36	-	0.95	0.24
75	3.20	34.20	7.48	0.63	0.28	400	0.37	34.51	-	1.09	0.22
100	3.20	34.27	6.75	0.76	0.38	500	0.36	34.51	-	1.06	0.18

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
05	12	17:40				3	2				
Wind		Baro.	Air Temp,		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
SE	3	1028.0	6.8		As	8	C				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	8.21	34.60	5.69	0.66	0.44	125	2.35	34.38	7.38	0.54	0.22
10	8.03	34.58	7.06	0.68	0.36	150	1.56	34.29	6.95	0.86	0.28
20	8.10	34.60	7.24	0.59	0.36	200	0.72	34.33	7.07	0.99	0.18
30	6.39	34.56	7.06	-	-	250	0.72	34.26	7.41	0.66	0.20
50	4.25	34.22	6.43	0.61	0.30	300	0.63	34.34	6.90	0.90	0.18
75	3.38	34.22	6.42	-	-	400	0.53	34.34	6.56	0.89	0.22
100	2.98	34.24	6.45	0.78	0.12	500	0.36	34.33	6.55	-	-

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	12	20:10				4	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1023.0	6.5		As	10	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	9.00	34.61	125	3.26	34.29		
10	10.43	34.63	150	3.11	34.31		
20	10.51	34.63	200	1.01	34.29		
30	10.46	34.63	250	0.52	34.31		
50	7.60	34.38	300	0.49	34.33		
75	4.48	34.16	400	0.38	34.34		
100	3.29	34.40	500	0.30	34.34		

St.No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
07	12	22:40				4	3				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
SE	5	1023.0	6.5		As	10	C				
Z m	T °C	S ‰	O ₂ %	PO ₄ - P µg-at/L	NO ₂ - N µg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ - P µg-at/L	NO ₂ - N µg-at/L
0	9.50	34.70	6.43	0.63	0.32	125	0.53	34.36	6.58	0.90	0.24
10	10.10	34.58	7.16	0.63	0.18	150	0.53	34.29	-	0.87	0.17
20	10.10	34.58	6.79	0.66	0.29	200	0.68	34.31	6.58	-	-
30	5.65	34.29	6.74	0.72	0.18	250	0.54	34.33	6.46	0.93	0.22
50	4.16	34.29	-	0.72	0.14	300	0.45	34.33	6.53	-	-
75	3.76	34.22	6.85	0.72	0.38	400	0.37	34.33	-	-	-
100	2.54	34.51	6.58	0.77	0.16	500	0.37	34.33	5.80	-	-

St.No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	12	01:10				4	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1023.0	5.0		As	10	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	8.93	34.51	125	4.87	34.31		
10	8.96	34.52	150	3.53	34.25		
20	8.71	34.51	200	2.76	34.33		
30	8.20	34.51	250	1.37	34.31		
50	7.62	34.09	300	0.79	34.34		
75	5.55	34.36	400	0.50	34.34		
100	4.95	34.33	500	0.47	34.54		

4 월 (April)

조사선 척양호 (Chuk Yang Ho)

St.No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	10	07:10		4		1	0
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	1	1026.0	6.8			0	B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	5.84		34.49	20	5.21		34.34
10	5.22		-	30	4.74		34.40

St.No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	10	08:45		4		1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	1	1026.0	7.0			0	B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	6.18	34.54	100	2.17	34.24		
10	6.16	34.18	125	1.25	33.89		
20	4.69	33.98	150	0.73	33.89		
30	4.25	-	200	0.60	33.82		
50	4.02	-	250	0.43	33.91		
75	2.83	34.24	300	0.39	33.91		

St.No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	10	08:55		4		3	1
Wind		Baro.	Air Temp		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1026.0	6.7			0	B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	6.21	33.55	100	1.74	34.09		
10	5.91	33.46	125	1.70	33.66		
20	4.61	33.46	150	1.05	33.82		
30	4.51	33.96	200	0.67	33.78		
50	4.18	34.07	250	0.46	33.78		
75	2.62	34.47	300	0.44	33.78		

St.No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	10	10:50		4		2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1026.0	8.5		ci	1	B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	6.98	33.68	100	1.44	33.80		
10	5.50	33.98	125	0.95	33.81		
20	5.40	34.16	150	0.66	33.68		
30	4.29	33.77	200	0.65	33.78		
50	3.99	33.59	250	0.53	33.84		
75	2.62	33.73	300	0.44	33.84		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	10	13:10		4		2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1026.0	11.0			0	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	9.49	33.87	100	2.73	34.58		
10	8.37	33.87	125	0.81	34.22		
20	7.96	34.02	150	0.62	34.38		
30	6.75	33.86	200	0.65	34.34		
50	4.87	34.24	250	0.44	34.49		
75	2.92	34.58	300	0.43	34.49		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	10	15:25				3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1025.0	11.5		St	1	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	10.80	34.63	100	3.49	34.31		
10	10.00	34.69	125	2.54	34.31		
20	9.90	34.65	150	1.99	34.31		
30	9.79	34.65	200	1.79	34.34		
50	9.52	34.65	250	0.72	34.36		
75	9.29	34.49	300	0.59	34.36		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	10	17:55				4	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1024.0	11.6		St	1	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	11.09	34.65	100	4.41	34.25		
10	11.40	34.65	125	4.33	34.25		
20	10.30	34.65	150	3.52	34.29		
30	10.19	34.51	200	1.61	34.33		
50	10.01	34.63	250	0.81	34.34		
75	5.37	34.29	300	0.79	34.38		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	10	20:00				4	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1025.0	10.0			0	B
Z m	T C		S ‰	Z m	T C		S ‰
0	11.07		-	100	8.55		34.42
10	11.31		34.58	125	7.99		34.40
20	11.01		34.54	150	6.75		34.40
30	11.01		34.65	200	5.21		34.65
50	10.64		34.49	250	4.58		34.59
75	10.29		34.63	300	0.64		34.38

6월 (June)

조사선 척양호 (Chuk Yang Ho)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	10	05:50	50	4	13	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	1	1309.0	19.0			0	B
Z m	T C		S ‰	Z m	T C		S ‰
0	13.72		34.24	30	4.41		34.52
10	13.16		34.67	48	3.84		34.51
20	9.26		34.61				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	10	07:00	500	4	12	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1009.0	19.5			0	B
Z m	T C		S ‰	Z m	T C		S ‰
0	14.71		34.51	100	1.19		34.43
10	13.89		34.51	125	0.76		34.47
20	5.73		34.49	150	0.69		34.47
30	3.79		34.51	200	0.47		34.47
50	3.10		34.45	250	0.42		34.47
75	1.82		34.43	300	0.32		34.51

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	10	08:20	780	5	6	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	2	1009.0	20.0		St	3	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	10.50		34.61	100	1.20		-
10	7.91		34.58	125	0.73		34.42
20	6.11		34.58	150	0.55		34.42
30	4.44		34.49	200	0.44		-
50	3.40		34.43	250	0.42		-
75	2.15		34.43	300	0.40		-

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	10	10:25	1280		11	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	1	1007.0	22.0		St	3	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	17.89		34.76	100	2.56		34.38
10	17.02		34.74	125	1.35		34.42
20	14.66		34.74	150	1.13		34.42
30	13.32		34.78	200	0.56		34.45
50	8.02		34.61	250	0.48		34.45
75	4.70		34.49	300	0.45		34.45

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	10	12:50		2	19	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1007.0	22.3		Cc	4	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	17.45		34.76	100	5.19		34.47
10	16.70		34.79	125	3.74		34.42
20	16.50		34.76	150	2.51		34.38
30	14.96		34.81	200	1.33		34.43
50	10.76		34.74	250	0.81		34.45
75	8.51		34.65	300	0.50		34.45

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	10	15:00	1,760	2	20	3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1006.0	24.0		Cc	5	BC
Z m	T °C		S ‰	Z m		T °C	S ‰
0	17.97		34.74	100		8.50	34.63
10	16.42		34.74	125		5.15	34.49
20	16.16		34.78	150		3.70	34.40
30	15.60		34.78	200		2.63	34.36
50	10.55		34.74	250		1.89	34.38
75	9.23		34.67	300		0.93	34.38

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	10	17:00	1100	3	18	3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1006.0	23.5		Cc	6	BC
Z m	T °C		S ‰	Z m		T °C	S ‰
0	17.62		34.76	100		9.09	34.63
10	16.96		34.76	125		6.59	34.47
20	16.49		34.76	150		4.10	34.36
30	15.77		34.76	200		2.82	34.36
50	10.61		34.72	250		1.73	34.38
75	9.48		34.69	300		0.79	34.38

8 월 (August)

조사선 척양호 (Chuk Yang Ho)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	8	10:00		5	13	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1008.0	23.4		Cu	8	C

Z m	T °C	S ‰	C ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	24.50	33.28	5.90	0.09	0.05	30	9.60	34.02	7.08	0.09	0.05
10	22.57	33.50	7.33	0.07	0.02	50	6.50	34.24	6.95	0.05	0.04
20	15.80	33.82	7.09	0.08	0.13	75	5.84	34.18	7.49	0.09	0.02

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
02	8	10:40		4	13	1	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
NE	1	1008.0	28.9		Cu	8	C				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	24.58	-	5.75	0.02	0.07	100	1.86	34.20	6.11	0.09	0.31
10	21.99	33.55	5.29	0.08	0.06	125	0.75	34.20	5.95	0.09	0.08
20	12.12	33.95	6.68	0.12	0.10	150	0.44	34.20	6.03	0.03	0.14
30	9.51	33.89	7.09	0.06	0.20	200	0.40	34.20	6.21	0.01	0.11
50	4.76	34.22	7.07	-	-	250	0.32	34.25	6.39	0.59	0.10
75	3.11	34.22	6.58	0.30	0.22	300	0.33	34.24	6.21	0.52	0.02

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
03	8	12:10		4	19	1	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
NE	1	1008.0	29.0		Cu	6	BC				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	24.69	33.03	7.35	0.58	0.07	100	2.23	34.18	6.74	0.02	0.07
10	23.80	33.12	6.31	0.50	0	125	2.65	34.20	6.40	0.40	0.05
20	15.81	33.77	6.42	0.66	0.05	150	0.84	34.20	6.63	0.32	0.10
30	9.77	33.27	7.15	0.57	0.06	200	-	34.20	6.64	0.56	0.31
50	6.12	34.24	6.98	0.09	0.10	250	0.44	34.24	6.31	0.45	0.14
75	4.16	34.24	6.95	0.10	0.05	300	0.40	34.25	6.31	0.45	0.10

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
04	8	14:15		4	16	1	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
NE	1	1008.0	30.0		Cu	6	BC				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	24.90	33.57	7.15	0.09	0.06	100	2.41	34.20	6.79	0.08	0.59
10	24.07	33.60	7.16	0.10	0.05	125	1.38	34.22	6.61	0.12	0.26
20	13.78	33.84	7.15	0.12	0.04	150	0.78	34.24	6.36	0.23	0.12
30	10.56	34.02	7.08	0.09	0.02	200	0.51	34.25	6.34	0.23	0.14
50	7.40	34.24	7.10	0.07	0.11	250	0.41	34.24	6.11	0.30	0.17
75	4.54	34.25	6.36	0.14	0.24	300	0.40	34.24	6.03	0.39	0.18

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
05	8	16:50		4	14	1	1				
Wind		Baro.	Air Temp.		Cloud	Weather					
Direction	Force		Dry	Wet	Type		Amount				
NE	1	1003.0	30.0		Cl	4	BC				
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N
m	°C	‰	‰	µg-at/L	µg-at/L	m	°C	‰	‰	µg-at/L	µg-at/L
0	25.72	33.40	7.13	0.02	0.04	100	4.12	34.11	7.05	0.07	0.06
10	12.27	34.31	6.95	0.02	0.04	125	2.98	34.13	5.53	0.13	0.18
20	11.17	34.52	6.10	0.07	0.06	150	2.16	34.15	6.31	-	0.06
30	10.28	34.49	6.62	0.09	0.17	200	0.71	34.18	6.46	0.29	0.06
50	8.64	34.42	5.78	0.18	0.11	250	0.53	34.24	6.41	0.14	0.25
75	6.44	34.42	5.85	0.09	0.06	300	0.50	34.25	6.03	0.50	0.06

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	8	19:20		4	16	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1003.0	27.5		Cu	7	BC
Z	T		S	Z	T	S	
m	°C		‰	m	°C	‰	
0	24.83		-	100	4.59	-	
10	19.21		33.66	125	3.38	34.33	
20	11.97		34.49	150	1.94	33.95	
30	10.52		34.52	200	1.87	34.20	
50	8.04		34.38	250	0.60	34.24	
75	4.42		34.22	300	0.41	34.24	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
07	8	21:45				2	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
SW	2	1008.0	27.5				BC				
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N
m	°C	‰	‰	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L
0	23.99	33.68	6.69	0.01	0	100	2.14	34.25	6.69	-	-
10	24.00	33.32	6.67	0.02	0.01	125	1.43	34.24	6.21	0.28	0.12
20	16.14	34.13	6.52	0.01	0.22	150	0.83	34.02	6.52	0.24	0.11
30	13.14	34.54	5.33	0.28	0.10	200	0.76	34.04	5.43	0.64	0.02
50	9.45	34.45	6.31	0.14	0.11	250	0.61	34.25	5.58	0.55	0.08
75	3.31	34.29	6.57	0.19	0.06						

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	9	03:15				1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1006.0	26.0				BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	24.20	33.39	100	9.50	34.29		
10	23.66	33.33	125	5.77	34.33		
20	17.04	34.04	150	4.69	34.27		
30	15.91	34.27	200	2.00	34.09		
50	14.67	34.42	250	1.20	34.04		
75	14.14	34.40	300	0.62	34.04		

10월 (October)

조사선 척양호 (Chuk Yang Ho)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	25	11:55		4	17	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1028.0	16.6		As	5	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	15.97	33.63	30	14.38	33.62		
10	15.99	33.68	50	6.38	34.36		
20	14.97	33.60	75	1.99	34.47		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	25	12:40		3	20	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1028.0	16.7		As	5	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	15.58	33.64	100	1.15	34.43		
10	14.79	33.62	125	0.59	34.47		
20	14.67	33.62	150	0.55	34.51		
30	13.28	34.13	200	0.32	34.43		
50	5.88	34.42	250	0.32	34.51		
75	2.55	34.43	300	0.29	34.51		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	25	13:55		3	21	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1028.0	17.0		As	6	BC
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	15.01		33.68	100	1.67	34.43	
10	14.70		33.60	125	1.32	34.49	
20	14.61		33.60	150	1.29	34.49	
30	14.42		34.24	200	0.31	34.47	
50	5.07		34.42	250	0.32	34.51	
75	2.88		34.40	300	0.27	34.54	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	25	15:45		3	21	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1028.0	17.0		As	6	BC
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	14.81		33.64	100	1.25	34.49	
10	14.32		33.68	125	0.82	34.51	
20	13.99		33.60	150	0.41	34.51	
30	13.49		33.69	200	0.39	34.51	
50	6.19		34.36	250	0.27	34.56	
75	2.56		34.45	300	0.20	34.51	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	25	18:10				2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1028.0	16.8		As	5	BC
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	15.02		33.66	100	0.96	34.47	
10	14.53		33.60	125	0.62	34.43	
20	13.48		33.66	150	0.53	34.52	
30	12.73		34.40	200	0.40	34.16	
50	3.87		34.24	250	0.33	34.34	
75	1.80		34.47	300	0.27	34.31	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	25	20:35				2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1028.0	16.0				BC
Z m	T C		S ‰	Z m	T C		S ‰
0	14.73		33.51	100	0.95		34.31
10	14.43		33.46	125	0.69		34.31
20	14.19		33.44	150	0.51		34.29
30	13.30		33.91	200	0.25		34.18
50	5.88		33.98	250	0.24		34.25
75	3.38		34.31	300	0.21		33.98

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	25	22:50				2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1028.0	16.0				BC
Z m	T C		S ‰	Z m	T C		S ‰
0	15.81		33.40	100	5.24		34.24
10	15.34		33.28	125	1.86		34.18
20	14.24		33.30	150	0.60		34.25
30	13.99		34.02	200	0.36		34.25
50	13.90		34.18	250	0.37		34.25
75	6.15		34.25	300	0.34		34.29

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	26	01:15				2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1029.0	16.0				BC
Z m	T C		S ‰	Z m	T C		S ‰
0	15.90		33.39	100	6.30		34.16
10	15.46		33.30	125	1.17		34.05
20	14.30		33.31	150	0.62		34.38
30	14.50		34.02	200	0.38		34.53
50	14.01		34.15	250	0.35		34.49
75	12.72		34.18	300	0.30		34.33

12 월(December)

조사선 척양호 (Chuk Yang Ho)

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	15	10:15		4	17	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	1	1029.0	2.1		ci	6	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	6.98		32.82	30	6.61		32.81
10	6.72		32.79	50	6.63		32.83
20	6.65		32.81	75	4.66		32.81

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	15	10:15		4	17	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	1	1029.0	2.1		ci	6	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	6.53		32.84	100	5.67		32.81
10	5.99		32.80	125	3.96		32.98
20	6.61		32.73	150	3.05		33.00
30	6.59		32.73	200	2.03		33.08
50	6.51		32.79	250	1.72		33.13
75	6.40		32.82	300	1.20		33.11

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	15	12:00		4	21	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	1	1031.0	2.2		ci	6	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	6.43		32.84	100	2.85		32.98
10	6.30		32.76	125	2.34		33.03
20	6.51		32.73	150	2.09		33.09
30	6.41		32.83	200	2.03		33.13
50	6.39		32.79	250	1.36		33.13
75	6.06		32.82	300	1.36		33.18

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	15	13:25		4	21	3	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1031.0	2.2		Cl	6	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	6.53	32.85	100	2.35	33.15		
10	6.59	32.84	125	2.02	33.19		
20	6.51	32.81	150	1.93	33.24		
30	6.48	32.81	200	1.23	33.26		
50	6.20	32.82	250	0.83	33.44		
75	6.18	33.11	300	0.82	33.16		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	15	16:00		4	21	3	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1013.0	2.3		Cl	9	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	6.50	32.90	100	2.89	33.18		
10	6.29	32.90	125	1.74	33.17		
20	6.49	32.90	150	1.23	33.23		
30	6.41	32.90	200	0.82	33.23		
50	6.32	32.90	250	0.80	33.20		
75	3.98	33.08	300	0.73	33.24		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	15	18:30				3	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1013.0	2.0		Cl	9	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	7.52	32.90	100	4.60	32.94		
10	7.66	32.85	125	3.20	33.05		
20	7.61	32.84	150	1.90	33.42		
30	7.57	32.83	200	0.80	33.29		
50	7.46	32.88	250	1.22	33.25		
75	5.99	32.86	300	1.72	32.90		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	15	21:03				3	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1013.0	1.8		ci	9	C
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	10.93		33.10	100	6.56	32.86	
10	10.31		33.13	125	4.32	32.98	
20	10.20		33.02	150	2.39	32.88	
30	8.34		32.93	200	1.28	33.19	
50	8.02		32.88	250	1.20	32.97	
75	7.70		32.73	300	1.18	33.20	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	15	23:30				3	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1013.0	1.0				C
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	10.75		33.06	100	6.65	32.83	
10	10.64		33.07	125	5.11	32.92	
20	10.42		32.98	150	2.10	33.12	
30	9.79		32.94	200	0.94	33.24	
50	7.97		32.87	250	0.94	-	
75	6.69		32.84	300	0.74	33.19	

106 선 해 양 관 측 성 적
OCEANOGRAPHIC DATA, LINE 106

2월 (February)

조사선 지리산 (Chi Ri San)

St. No.		Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell			
02		14	04:40				2	1			
Wind			Baro.	Air Temp.		Cloud		Weather			
Direction	Force	Dry		Wet	Type	Amount					
SW		3	1013.0	1.0			4	BC			
Z m	T °C	S ‰	O ₂ %	PO ₄ - P μg-at/L	NO ₂ - N μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ - P μg-at/L	NO ₂ - N μg-at/L
0	3.19	33.75	7.90	0.70	0.52	30	3.09	33.82	7.58	0.64	0.29
10	3.19	33.75	7.58	0.68	0.31	50	2.99	33.87	7.31	0.69	0.28
20	3.20	33.82	7.75	0.60	0.31						

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
03	14	03:20				3	2				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
NW	4	1013.0	1.3			6	BC				
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	3.52	33.93	6.17	0.54	0.24	100	3.29	33.93	-	0.59	0.29
10	3.49	33.93	7.58	0.59	0.36	125	3.20	33.93	6.96	0.64	0.28
20	3.40	33.98	7.70	0.57	0.26	150	3.29	33.96	7.58	0.32	0.42
30	3.39	33.89	7.53	0.65	0.31	200	3.09	33.95	7.28	0.68	0.26
50	3.30	33.87	7.53	0.68	0.34	250	1.58	34.15	7.06	1.04	0.24
75	3.30	33.86	7.53	0.59	0.18	300	1.06	34.15	7.00	1.04	0.25

S t. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
04	14	00:45				3	2				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
SW	4	1013.0	1.0								
Z m	T °C	S ‰	O ₂ %	PO ₄ -P µg-at/L	NO ₂ -N µg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P µg-at/L	NO ₂ -N µg-at/L
0	4.07	34.16	7.48	0.63	0.19	125	3.18	34.20	7.27	0.95	0.38
10	3.53	34.09	7.58	0.64	0.24	150	2.34	34.27	6.95	1.08	0.26
20	3.50	34.07	7.58	0.68	0.34	200	1.47	34.16	6.46	1.05	0.43
30	3.47	34.09	6.53	0.63	0.25	250	1.03	34.16	6.22	0.53	0.44
50	3.37	34.07	7.07	0.81	0.12	300	0.55	34.16	4.43	0.45	0.56
75	3.32	33.95	7.08	0.79	0.31	400	0.43	34.16	6.19	0.54	0.54
100	3.29	34.09	5.80	0.93	0.31	500	0.35	34.18	6.85	0.54	0.14

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
05	13	22:10				4	3				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
SW	5	1013.0	2.8			7	BC				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	4.95	34.11	6.37	0.14	0.31	125	-	34.22	7.32	0.63	0.34
10	4.54	34.07	7.38	0.74	0.29	150	2.89	34.25	7.24	0.13	0.31
20	3.45	34.09	7.52	0.81	0.24	200	1.70	34.33	5.80	0.63	0.28
30	3.34	34.11	7.69	0.54	0.12	250	1.00	34.36	6.22	0.68	0.22
50	3.40	34.09	-	0.57	0.14	300	0.71	34.38	4.33	-	-
75	3.34	34.09	7.38	0.56	0.12	400	0.79	34.38	6.09	-	-
100	3.32	34.13	7.38	0.14	0.34	500	0.66	34.38	6.11	-	-

St. No.	date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	13	19:33				5	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1013.0	4.8			7	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	7.52	34.54	125	1.59	34.33		
10	7.49	34.54	150	1.53	34.34		
20	7.49	34.38	200	0.92	34.34		
30	6.18	34.34	250	0.73	34.36		
50	6.08	34.27	300	0.56	34.40		
75	3.46	34.24	400	0.54	34.49		
100	2.98	34.33	500	0.23	34.49		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
07	13	17:00		4	15	4	3				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
NW	5	1014.0	5.0		As	10	R				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	7.59	34.45	6.74	0.86	0.31	125	-	34.27	6.74	0.63	0.46
10	7.59	34.45	6.79	0.86	0.26	150	2.43	34.34	6.01	0.54	0.35
20	7.51	34.40	5.58	0.90	0.28	200	2.46	34.25	7.56	0.81	0.50
30	6.06	34.31	7.06	0.95	0.36	250	2.05	34.27	7.17	-	-
50	4.36	34.24	7.27	0.59	0.38	300	0.91	-	5.79	0.95	0.21
75	3.56	34.24	7.16	0.62	-	400	0.27	34.34	6.16	0.63	0.22
100	2.45	34.29	7.06	0.57	0.48	500	0.17	34.38	5.88	0.63	0.25

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	13	14:30		4	16	5	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1014.0	5.3		As	10	R
Z m	T C	S ‰	Z m	T C	S ‰		
0	7.35	34.55	125	3.56	34.38		
10	7.40	34.49	150	2.43	34.42		
20	7.50	34.49	200	1.63	34.45		
30	6.94	34.43	250	1.47	34.42		
50	3.77	34.13	300	0.88	34.38		
75	3.79	34.25	400	0.40	34.40		
100	3.58	34.34	500	0.38	34.40		

St. No.		Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell			
09		13	12:00		4	16	5	4			
Wind			Baro.	Air Temp.		Cloud		Weather			
Direction		Force		Dry	Wet	Type	Amount				
NW		5	1014.0	6.0		As	15	C			
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	10.0	34.74	5.88	0.72	0.46	125	3.92	34.36	7.16	0.58	0.24
10	9.80	34.82	6.22	0.63	0.36	150	3.89	34.45	7.37	0.59	0.31
20	11.29	34.79	6.41	0.68	0.30	200	3.69	34.34	5.27	0.77	0.42
30	11.22	34.79	6.11	0.69	0.36	250	2.60	34.43	6.11	0.79	0.42
50	8.60	34.78	6.11	0.55	0.38	300	1.56	34.38	6.32	0.77	0.36
75	6.99	34.52	6.59	0.59	0.47	400	0.91	34.40	5.27	0.81	0.36
100	6.57	34.24	-	0.59	0.48	500	0.47	34.42	6.06	0.81	0.26

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	13	09:30		4	14	5	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1014.0	6.7		As	10	R
Z m	T C	S ‰	Z m	T C	S ‰		
0	10.60	34.56	125	3.80	34.25		
10	10.91	34.56	150	3.62	34.24		
20	10.35	34.60	200	3.59	34.47		
30	10.35	34.60	250	3.24	34.78		
50	10.18	34.60	300	1.62	34.54		
75	6.54	34.45	400	1.08	34.52		
100	4.14	34.45	500	0.48	34.47		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
11	13	07:10				5	4				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
NW	5	1014.0	5.8			10	C				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	11.30	34.69	7.21	-	-	125	9.64	34.56	6.33	0.68	0.18
10	11.62	34.58	6.11	0.64	0.29	150	9.63	34.42	6.33	0.75	0.14
20	11.20	34.70	5.94	0.65	0.22	200	5.02	34.15	7.11	0.59	0.32
30	11.19	34.56	6.32	0.72	0.24	250	4.28	34.09	7.53	0.51	0.38
50	11.18	34.56	6.27	0.68	0.32	300	4.03	34.07	7.90	0.69	0.36
75	11.19	34.54	6.23	0.59	0.24	400	3.57	34.07	7.58	0.68	0.47
100	9.67	34.45	5.90	6.69	0.18	500	2.17	34.43	6.13	0.90	0.29

4월 (April)

조사선 척양호 (Chuk Yang Ho)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	11	10:40		4		4	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1025.0	11.5		Cs	10	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	8.12	34.07	30	6.09	34.20		
10	8.02	34.25	50	4.62	34.25		
20	6.89	34.20					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell	
03	11	11:30		4		3	3	
Wind		Baro.	Air Temp.		Cloud		Weather	
Direction	Force		Dry	Wet	Type	Amount		
SW	3	1025.0	11.6		Cs	10	C	
Z m	T C		S ‰		Z m	T C		S ‰
0	8.50		34.20		100	1.47		34.29
10	8.12		34.18		125	0.94		34.29
20	8.01		34.25		150	0.78		34.33
30	7.74		34.34		200	0.57		34.33
50	4.76		34.29		250	0.35		34.36
75	2.83		34.27		300	0.29		34.36

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	11	12:40				3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1025.0	12.0		Ns	10	R
Z m	T C	S ‰	Z m	T C	S ‰		
0	10.80	34.36	100	2.62	34.15		
10	10.70	34.60	125	2.02	34.31		
20	10.73	34.60	150	1.20	34.31		
30	10.32	34.60	200	0.61	34.33		
50	9.32	34.54	250	0.54	34.33		
75	6.89	34.42	300	0.42	34.34		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	12	11:00		4		2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1030.0	13.5			0	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	11.55	34.65	100	4.16	34.31		
10	11.34	34.67	125	2.20	34.33		
20	11.24	34.67	150	1.57	34.31		
30	11.20	34.65	200	1.57	34.31		
50	10.31	34.65	250	0.56	34.33		
75	8.91	34.54	300	0.46	34.33		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	12	13:25				2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1030.0	13.0			0	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	11.59	-	100	6.98	34.45		
10	10.97	34.65	125	3.51	34.24		
20	10.52	34.61	150	3.20	34.25		
30	10.42	34.60	200	2.98	-		
50	10.38	34.61	300	3.01	-		
75	9.65	34.54					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	12	15:40				3	2
Wind		Baro.	Air Temp		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	3						
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	11.34	34.58	100	5.46	34.31		
10	10.75	34.60	125	4.11	34.29		
20	10.64	34.65	150	3.09	34.33		
30	10.59	34.63	200	1.55	34.31		
50	10.30	-	250	0.68	34.33		
75	9.09	34.52	300	0.58	34.31		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	12	18:15				3	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	3				Cl	1	B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	12.24	34.74	100	5.73	34.36		
10	12.36	34.76	125	3.57	34.24		
20	12.08	34.72	150	2.35	34.24		
30	11.18	34.69	200	1.13	34.29		
50	10.67	34.67	250	0.53	34.24		
75	9.45	34.52	300	0.55	34.24		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	12	20:30				3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	3	1027.0	12.5				B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	12.94	34.72	100	9.77	34.51		
10	12.70	34.61	125	8.83	34.49		
20	12.62	34.79	150	5.01	34.18		
30	12.14	34.70	200	2.04	34.33		
50	11.47	34.65	250	0.73	34.36		
75	10.38	34.54	300	0.63	34.31		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	12	23:30				2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1027.0	11.5				B
Z m	T C	S ‰	Z m	T C	S ‰		
0	10.70	34.42	100	10.10	34.56		
10	10.60	34.61	125	9.91	34.54		
20	10.53	34.56	150	9.69	34.56		
30	10.33	34.56	200	8.08	34.33		
50	10.33	34.58	250	5.42	34.38		
75	10.33	34.52	300	1.80	34.42		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	13	01:40				1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1028.0	12.0				BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	10.31	34.52	100	10.32	34.43		
10	10.51	34.56	125	10.12	34.42		
20	10.52	34.56	150	9.89	34.42		
30	10.50	34.54	200	6.77	34.20		
50	10.38	34.54	250	2.06	34.13		
75	10.39	34.42	300	1.98	34.09		

6월 (June)

조사선 척양호 (Chuk Yang Ho)

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	13	08:20	51	4	11	1	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1007.0	17.5		Cu	1	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	14.78	34.40	30	6.89	34.54		
10	13.08	34.51	50	3.00	34.42		
20	12.47	34.43					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	13	09:40	210	4	11	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1009.0	19.0		Cu	1	B
Z m	T C	S ‰		Z m	T C	S ‰	
0	15.79	34.63		75	1.94	34.42	
10	11.54	34.60		100	1.15	34.40	
20	9.32	34.58		125	0.99	34.40	
30	6.61	34.54		150	0.63	34.42	
50	3.39	34.43		200	0.49	34.42	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	13	11:00	680	4	11	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1009.0	18.0		Cu	1	B
Z m	T C	S ‰		Z m	T C	S ‰	
0	16.14	34.65		100	1.37	34.40	
10	15.91	34.65		125	0.95	34.40	
20	9.52	34.63		150	0.66	34.40	
30	6.21	34.52		200	0.49	34.49	
50	3.83	34.42		250	0.50	34.47	
75	1.69	34.40		300	0.38	34.47	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	13	13:50	1090	3	17	3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1009.0	21.0		Cu	1	B
Z m	T C	S ‰		Z m	T C	S ‰	
0	18.31	34.69		100	1.63	34.40	
10	17.20	34.69		125	1.18	34.42	
20	15.17	34.70		150	0.90	34.42	
30	10.74	34.69		200	0.34	34.27	
50	10.19	34.61		250	0.35	34.33	
75	4.64	34.47		300	0.33	34.37	

St. No	Date	Time	Depth	Weather Color.	Water Trans.	Wave	Swell
06	13	16:20	1000	4	14	3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1009.0	19.5		st	1	B
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	19.61	34.69	100	1.61	34.42		
10	17.79	34.65	125	1.15	34.42		
20	17.02	34.69	150	0.71	34.42		
30	11.00	34.69	200	0.69	34.42		
50	7.19	34.54	250	0.47	34.42		
75	3.15	34.42	300	0.44	34.42		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	13	18:25		4	11	3	3
Wind		Baro.	Air Temp		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1009.0	19.0		As	1	B
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	17.56	34.52	100	1.76	34.42		
10	16.58	34.60	125	1.31	34.38		
20	14.45	34.67	150	1.16	34.42		
30	10.04	34.67	200	0.76	34.38		
50	5.42	34.56	250	0.50	34.38		
75	2.57	34.43	300	0.50	34.38		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	13	21:00				3	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1009.0	17.0				B
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	18.10	34.67	100	10.70	34.74		
10	17.81	34.67	125	5.39	34.54		
20	17.33	34.70	150	3.33	34.51		
30	16.53	34.76	200	1.01	34.34		
50	14.17	34.81	250	0.67	34.38		
75	12.76	34.79	300	0.51	34.43		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	13	23:25				4	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	1	1009.0	18.8				B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	18.41	34.69	100	10.91	34.69		
10	18.41	34.70	125	10.03	34.67		
20	18.10	34.74	150	8.88	34.60		
30	16.45	34.70	200	5.21	34.49		
50	14.55	34.83	250	1.66	34.53		
75	11.84	34.72	300	1.14	34.43		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	14	01:50					5
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	4	1011.0	18.0				B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	18.17	34.76	100	11.24	34.72		
10	18.17	34.76	125	10.63	34.72		
20	18.07	34.74	150	9.90	34.61		
30	17.19	34.83	200	8.10	34.54		
50	16.19	34.83	250	4.89	34.47		
75	13.86	34.81	300	1.19	34.42		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	14	04:05				4	5
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	4	1011.0	17.5		St	1	B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	17.93	34.74	100	10.79	34.72		
10	17.93	34.69	125	10.17	34.67		
20	17.74	34.61	150	10.01	34.65		
30	16.66	34.61	200	9.68	34.63		
50	13.94	34.76	250	8.57	34.61		
75	11.26	34.76	300	5.88	34.63		

8월 (August)

조사선 척양호 (Chuk Yang Ho)

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
02	22	10:15		3	16	1	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
SE	1	1020.0	24.4		Cl	3	BC				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	22.52	-	5.48	0.11	0.11	20	13.30	34.00	5.79	0.02	0.02
10	20.60	33.17	5.32	0.29	0.13	30	8.47	33.96	5.29	0.18	0.02

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
03	22	11:20		3	13	1	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
SE	1	1021.0	24.6		Cl	3	BC				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	23.03	33.69	5.37	0.06	0.14	100	2.79	34.02	6.52	0.62	0.12
10	22.53	33.69	5.27	0.15	0.17	125	0.83	34.02	6.13	0.70	0.04
20	12.53	33.93	6.52	0.34	0.13	150	0.53	34.25	6.01	0.05	0.04
30	7.72	34.00	6.84	0.37	0.13	200	0.59	34.27	5.91	0.09	0.02
50	4.36	34.25	6.56	0.54	0.16	250	0.52	34.00	-	-	-
75	3.00	34.02	6.84	0.64	0.12	300	0.50	34.25	-	-	-

St.No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
04	22	12:50		3	16	1	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
SE	1	1020.0	24.3		Cl	2	B				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	23.23	32.88	5.57	0.16	0.25	100	2.05	34.02	5.53	0.98	0.02
10	22.74	33.28	5.27	0.33	0.04	125	1.15	34.05	5.26	0.69	0.04
20	19.50	33.78	5.42	0.23	0.08	150	0.91	34.00	6.41	0.87	0.04
30	10.26	34.04	5.54	0.45	0.18	200	0.50	34.07	6.63	0.81	0.02
50	5.60	34.13	6.31	0.50	0.05	250	0.42	34.05	5.83	0.06	0.06
75	2.78	34.02	6.41	0.63	0.04	300	0.37	34.64	6.11	0.02	0.07

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
05	22	15:25		3	18	1	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
SE	1	1020.0	24.6		ci	2	B				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	24.09	33.30	6.56	0.02	0.04	100	3.27	34.07	5.86	0.82	0.02
10	22.49	33.10	5.27	0.56	0.04	125	2.39	34.04	6.21	0.76	0.04
20	20.87	33.57	5.47	0.58	0.06	150	1.44	34.31	5.47	0.64	0.04
30	11.64	34.24	6.78	0.55	0.07	200	0.59	34.07	6.27	0.77	0.06
50	5.30	34.18	5.58	0.63	0.07	250	0.59	34.07	6.63	0.03	0.06
75	4.64	34.09	5.79	0.78	0.08	300	0.41	34.07	6.00	0.02	0.07

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	22	17:55		3	16	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1019.0	29.8		Ci	1	B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	23.52	32.99	100	3.50	33.98		
10	22.08	33.06	125	2.32	34.04		
20	11.81	33.75	150	2.42	34.05		
30	8.60	34.07	200	0.82	34.05		
50	7.68	34.11	250	0.79	34.09		
75	5.43	34.05	300	0.50	34.05		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
07	22	20:10				1	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
SE	1	1020.0	21.7		Ci	1	B				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	22.82	32.72	5.27	0.02	0.07	100	2.14	33.59	6.31	0.76	0.06
10	22.82	33.12	6.73	0.07	0.04	125	1.60	33.57	6.21	0.70	0.05
20	14.46	33.73	6.75	0.11	0.04	150	0.60	33.55	5.81	0.67	0.05
30	8.67	34.09	6.79	0.41	0.04	200	0.65	34.02	6.15	0.74	0.06
50	5.37	34.05	6.63	0.57	0.02	250	0.59	34.04	6.00	0.67	0.05
75	3.12	33.95	6.63	0.43	0.04	300	0.45	34.05	6.01	0.86	0.05

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	22	22:45				1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1020.0	20.5				BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	21.17	34.05	100	2.95	34.05		
10	19.62	34.24	125	2.62	34.02		
20	15.97	33.93	150	2.30	34.02		
30	10.84	33.39	200	1.03	34.04		
50	9.12	33.76	250	0.26	34.05		
75	8.38	33.98	300	0.13	34.04		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
09	9	10:40		4	21	3	2				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
E	3	1008.0	25.0		Cu	10	R				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	24.41	33.12	5.27	0.07	0.04	100	12.63	34.36	5.87	0.28	0.64
10	24.29	33.31	5.82	0.01	0.16	125	8.61	-	5.85	0.23	0.25
20	18.33	33.77	5.43	0.01	0.10	150	6.57	34.36	5.96	0.50	0.24
30	16.22	34.02	5.35	0.27	0.14	200	3.43	34.00	5.46	0.36	0.22
50	14.99	34.38	5.35	0.23	0.28	250	2.02	34.00	6.05	0.05	0.19
75	14.30	34.33	5.60	0.33	0.14	300	0.99	34.02	5.89	0.06	0.16

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	9	08:20		3	17	2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	3	1006.0	24.5		Cu	10	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	24.07	33.50	100	11.96	34.38		
10	24.00	33.01	125	10.13	34.29		
20	23.40	33.93	150	8.38	34.20		
30	19.33	34.20	200	4.33	34.05		
50	15.17	34.36	250	2.72	34.05		
75	14.55	34.43	300	2.08	34.02		

St. No	Date	Time	Depth	Water Color	Water Trans.	Wave	Swell				
11	9	05:45				2	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
E	2	1008.0	25.7		Cu	10	C				
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	25.35	32.90	6.66	0.07	0.07	100	10.91	34.33	6.10	0.11	0.07
10	25.31	32.88	5.79	0.01	0.22	125	10.23	34.25	5.96	0.17	0.10
20	25.16	32.90	6.00	0.07	0.10	150	9.85	34.25	6.11	0.15	0.06
30	17.57	34.27	6.16	0.38	0.08	200	7.36	34.11	5.54	0.10	0.22
50	14.14	34.46	5.79	0.19	0.02	250	3.53	34.05	6.31	0.45	0.05
75	11.65	34.38	5.79	0.20	0.11	300	1.74	34.05	5.81	0.52	0.06

10월 (October)

조사선 척양호 (Chuk Yang Ho)

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	18	10:35		4	16	1	1
Wind		Baro.	Air Temp.		Cloud		Weather.
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1029.0	16.5		Cl	6	BC
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	18.27	33.71	30	12.76	34.09		
10	18.24	33.71	50	3.84	34.45		
20	15.08	33.87					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	18	11:50		3	20	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1018.0	17.5		Cl	6	BC

Z	T	S	Z	T	S
m	°C	‰	m	°C	‰
0	19.39	33.64	100	1.85	34.45
10	19.18	33.57	125	1.07	34.45
20	19.01	33.53	150	0.69	34.49
30	18.39	34.00	200	0.42	34.49
50	8.12	34.47	250	0.36	34.51
75	3.42	34.45	300	0.36	34.51

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	18	12 30		4	19	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1018.0	17.5		Cl	7	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	19.32	33.60	100	1.45	34.33		
10	19.16	33.55	125	0.70	34.45		
20	19.01	33.55	150	0.68	34.56		
30	18.67	33.86	200	0.32	34.43		
50	8.79	34.47	250	0.32	34.43		
75	3.71	34.45	300	0.29	34.47		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	17	19:10				1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1029.0	16.2		Cl	6	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	19.32	33.51	100	5.58	34.60		
10	19.44	33.30	125	3.08	34.52		
20	19.41	33.26	150	2.13	34.52		
30	14.02	33.01	200	0.75	-		
50	12.09	33.78	250	0.48	34.52		
75	6.51	33.75	300	0.31	34.51		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	17	16:35		3	20	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1029.0	16.9		Cl	8	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	20.11	33.78	100	10.57	34.45		
10	20.37	33.75	125	6.08	34.40		
20	20.22	33.59	150	3.12	34.25		
30	19.66	33.82	200	0.84	34.42		
50	16.43	34.40	250	0.43	34.22		
75	14.25	34.56	300	0.43	34.24		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	17	15:10		3	21	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1029.0	17.6		Cl	8	C
Z	T		S	Z	T	S	
m	°C		‰	m	°C	‰	
0	19.69		33.86	100	13.78	34.69	
10	19.61		33.80	125	8.34	34.69	
20	19.60		33.78	150	5.48	34.36	
30	18.99		33.73	200	2.04	34.52	
50	17.26		34.15	250	0.87	34.25	
75	15.36		34.49	300	0.53	34.25	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	17	13:10		3	21	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1029.0	17.4		Cu	9	C
Z	T		S	Z	T	S	
m	°C		‰	m	°C	‰	
0	21.72		34.05	100	15.89	34.16	
10	21.61		33.68	125	10.80	34.70	
20	21.60		34.00	150	10.80	34.69	
30	21.60		33.96	200	5.90	34.70	
50	20.07		33.89	250	2.51	34.56	
75	16.01		33.75	300	1.12	34.29	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	17	10:45		3	21	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1029.0	17.4		Cu	10	C
Z	T		S	Z	T	S	
m	°C		‰	m	°C	‰	
0	20.08		33.93	100	12.13	34.69	
10	20.01		34.09	125	10.45	34.70	
20	20.01		34.02	150	8.15	34.51	
30	20.01		34.02	200	7.64	34.43	
50	19.95		34.05	250	3.55	34.27	
75	15.99		34.00	300	1.32	34.29	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	15	00:40				2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1020.0	16.0				C
Z m	T C	S ‰	Z m	T C	S ‰		
0	20.49	33.78	100	13.92	34.70		
10	20.46	33.98	125	11.01	34.62		
20	20.37	34.37	150	9.58	34.54		
30	20.20	33.98	200	6.11	34.40		
50	20.01	34.04	250	1.85	34.56		
75	18.61	34.49	300	0.74	34.54		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	15	04:25				2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1020.0	16.0				C
Z m	T C	S ‰	Z m	T C	S ‰		
0	20.50	34.05	100	16.42	34.09		
10	20.48	34.07	125	10.75	34.54		
20	20.56	34.05	150	9.03	34.51		
30	20.56	34.05	200	5.60	34.67		
50	19.91	34.09	250	1.75	34.52		
75	18.35	34.67	300	0.75	34.29		

12월 (December)

조사선 척양호 (Chuk Yang Ho)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	11	10:00	35	4	16	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	1	1026.0	2.8		Gu	9	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	9.33	32.86	20	9.20	32.88		
10	9.21	32.32	30	9.08	32.82		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	11	11:00		4	18	1	
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	1	1026.0	2.6		Cu	9	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	9.11	32.82	75	8.22	32.86		
10	9.10	32.84	100	4.80	33.06		
20	9.18	32.82	125	4.68	33.11		
30	9.13	32.79	150	4.36	33.15		
50	8.34	32.75	200	1.94	33.19		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	11	11:40	570	4	18	1	
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	1	1026.0	2.6		Cu	9	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	9.01	32.78	100	5.31	33.02		
10	9.20	32.81	125	4.23	33.11		
20	9.03	32.81	150	2.50	33.08		
30	8.91	32.78	200	1.68	33.22		
50	8.59	32.69	250	0.77	33.02		
75	7.31	32.84	300	0.36	33.88		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	10	22:50				2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	2	1028.0	1.0				BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	12.54	33.13	100	5.13	33.19		
10	12.55	33.07	125	5.11	33.25		
20	12.52	33.03	150	0.49	33.25		
30	12.48	33.11	200	0.41	33.25		
50	10.18	33.39	250	0.26	33.26		
75	9.34	33.21	300	0.66	33.23		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	9	20:25				2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1028.0	1.0		ci		BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	14.75	33.12	100	7.62	33.57		
10	15.20	33.07	125	4.77	33.35		
20	15.17	33.05	150	1.49	33.29		
30	15.14	33.21	200	1.50	33.40		
50	15.10	33.37	250	0.30	33.27		
75	15.06	33.11	300	0.29	33.25		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	9	17:50		4	20	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1028.0	1.4		ci	3	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	14.03	33.36	100	11.77	33.32		
10	14.28	33.07	125	7.15	33.30		
20	14.26	33.02	150	3.65	33.30		
30	14.23	33.15	200	0.40	33.40		
50	14.10	33.16	250	0.28	33.26		
75	14.01	33.10	300	0.29	33.23		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	9	15:25		3	21	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1030.0	1.5		ci	1	B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	13.97	33.08	100	12.99	33.55		
10	14.31	33.04	125	10.68	33.33		
20	14.29	33.04	150	4.47	33.25		
30	14.25	33.03	200	0.67	33.22		
50	14.16	-	250	0.53	33.48		
75	14.15	33.52	300	0.48	33.54		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	9	12:50		3	21	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1030.0	1.4		Cl	1	B
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	13.94	33.10	100	12.15	33.09		
10	14.37	33.08	125	11.05	33.41		
20	14.31	33.07	150	4.57	33.26		
30	14.25	33.08	200	0.39	33.24		
50	14.16	33.07	250	0.46	33.21		
75	14.11	33.53	300	0.45	33.29		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	9	10:30		3	21	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1031.0	1.0				BC
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	13.83	33.07	100	14.01	33.10		
10	14.62	33.04	125	12.48	33.45		
20	14.54	33.03	150	10.88	33.45		
30	14.26	33.06	200	1.71	33.42		
50	14.19	-	250	0.49	33.26		
75	14.05	33.06	300	0.36	33.13		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	9	08:30				1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1031.0	1.0				BC
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	13.44	-	100	13.41	34.08		
10	13.39	32.15	125	11.61	33.72		
20	14.36	32.93	150	9.68	33.47		
30	14.19	33.07	200	1.10	33.39		
50	14.17	-	250	0.76	33.23		
75	14.00	33.03	300	0.88	33.12		

105 선 해 양 관 측 성 적
OCEANOGRAPHIC DATA, LINE 105

2월 (February)

조사선 지리산(Chi Ri San)

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
03	14	12:10		4	15	3	2				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
NW	3	1015.0	2.6		As	4	BC				
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	4.11	34.02	7.85	0.51	0.43	30	3.29	33.82	7.81	0.57	0.17
10	3.51	33.62	7.38	0.74	0.23	50	3.29	33.82	7.53	0.68	0.24
20	3.30	33.62	7.38	-	-						

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
04	14	13:10		4	16	3	2				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
NW	3	1015.0	3.5		As	4	BC				
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -P μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	9.55	34.58	7.09	0.77	0.34	100	3.94	33.96	7.27	0.63	0.36
10	10.09	34.58	6.59	1.40	0.47	125	3.92	33.96	7.17	0.77	0.31
20	10.59	34.57	5.85	0.74	0.54	150	3.42	34.16	6.11	0.90	0.30
30	10.63	34.43	6.11	0.77	0.48	200	1.31	34.16	5.27	0.99	0.20
50	4.48	33.98	7.40	0.66	0.38	250	1.02	34.20	6.74	1.04	0.12
75	4.47	34.00	7.38	0.60	0.18						

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	14	1430		3	16	3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1015.0	5.7		Cs	1	B

Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	10.32	34.52	5.96	0.72	0.31	125	2.09	34.13	6.48	1.04	0.42
10	11.42	34.47	6.11	0.74	0.34	150	1.06	34.16	6.95	0.95	0.26
20	11.52	34.52	6.11	0.68	0.25	200	1.04	34.20	6.68	0.99	0.19
30	11.62	34.54	7.11	0.77	0.30	250	0.58	34.16	6.48	0.87	0.22
50	11.32	34.52	6.17	0.81	0.36	300	0.47	34.18	6.68	1.04	0.20
75	8.36	34.31	6.32	0.77	0.30	350	0.45	34.25	6.64	0.81	0.25
100	5.12	34.09	7.06	0.80	0.42						

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	14	16:30		4	16	4	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1015.0	5.5		CS	4	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	9.40	34.43	125	10.66	34.42		
10	10.13	34.43	150	10.59	34.38		
20	11.02	34.43	200	9.38	34.29		
30	11.02	34.45	250	4.50	34.24		
50	11.06	34.45	300	1.58	34.22		
75	10.96	34.40	400	0.75	34.24		
100	10.83	34.43	500	0.46	34.20		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
07	14	16:30		4	16	4	4				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
NW	3	1015.0	5.5		CS	4	BC				
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N
m	°C	‰	‰	µg-at/L	µg-at/L	m	°C	‰	‰	µg-at/L	µg-at/L
0	7.43	34.45	6.69	0.63	0.47	125	10.74	34.60	6.65	0.72	0.29
10	10.84	34.47	6.27	0.69	0.38	150	10.54	34.70	5.80	0.77	0.24
20	10.84	34.49	6.14	0.72	0.30	200	6.61	34.70	5.80	0.89	0.58
30	11.08	34.47	6.32	0.77	0.34	250	2.67	34.70	5.27	0.84	0.36
50	11.12	34.49	6.16	0.77	0.31	300	0.92	34.49	6.11	1.13	0.43
75	11.12	34.45	6.36	0.68	0.47	400	0.57	34.47	6.45	1.08	0.30
100	11.01	34.49	6.32	0.68	0.22	500	0.42	34.47	7.02	1.26	0.24

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	14	21:40				3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1020.0	3.5				
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	10.36	34.70	125	10.52	34.67		
10	10.22	34.72	150	9.99	34.65		
20	10.92	34.67	200	8.82	34.65		
30	11.01	34.67	250	4.91	34.49		
50	11.04	34.69	300	2.27	34.47		
75	10.83	34.67	400	1.15	34.49		
100	10.81	34.52	500	0.53	34.47		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
09	15	01:03				2	2				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
NW	2	1020.0				3	BC				
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N
m	°C	‰	‰	µg-at/L	µg-at/L	m	°C	‰	‰	µg-at/L	µg-at/L
0	10.45	34.67	5.58	0.77	0.24	125	10.21	34.63	6.45	0.74	0.34
10	10.72	34.67	—	0.77	0.28	150	10.20	34.51	—	0.77	0.38
20	10.72	34.63	6.32	0.81	0.30	200	9.69	34.56	6.53	0.99	0.19
30	10.73	34.63	5.90	0.77	0.46	250	4.53	34.47	6.11	0.99	0.12
50	10.71	34.65	6.22	0.68	0.26	300	3.84	34.49	6.22	0.95	0.16
75	10.60	34.67	5.22	0.69	0.25	400	1.47	34.33	6.22	0.81	0.18
100	10.31	34.65	6.23	0.73	0.24	500	0.66	34.49	6.43	0.86	0.54

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	15	02:30				3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1020.3	3.0			3	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	9.57	34.65	125	10.46	34.49		
10	10.24	34.67	150	10.21	34.43		
20	10.42	34.70	200	8.88	34.56		
30	10.62	34.67	250	8.28	34.51		
50	10.62	34.65	300	2.72	34.56		
75	10.63	34.67	400	1.35	34.42		
100	10.61	34.52	500	0.84	34.36		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
11	15	05:10				3	2				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
NW	3	1023.0	3.2			1	B				
Z m	T C	S ‰	O ₂ ‰	PO ₄ -P µg-at/L	NO ₂ -N µg-at/L	Z m	T C	S ‰	O ₂ ‰	PO ₄ -P µg-at/L	NO ₂ -N µg-at/L
0	9.90	34.49	6.22	0.68	0.20	125	10.56	34.51	6.01	0.98	0.22
10	10.11	34.52	—	0.67	0.31	150	10.51	34.60	6.01	0.83	0.30
20	10.48	34.47	6.23	0.63	0.19	200	9.80	34.52	5.87	0.87	0.24
30	10.63	34.49	—	0.64	0.22	250	4.52	34.36	6.02	0.95	0.30
50	10.74	34.65	6.79	0.69	0.26	300	1.98	34.33	6.58	0.95	0.32
75	10.66	34.43	6.78	0.77	0.28	400	1.37	34.27	6.26	1.04	0.30
100	10.59	34.47	5.87	0.74	0.14	500	1.18	34.43	6.32	0.77	0.26

4월 (April)

조사선 척양호 (Chuk Yang Ho)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	14	20:30				3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1015.0	13.0				C
Z m	T C		S ‰		Z m	T C	S ‰
0	12.40		-		30	6.50	-
10	12.20		-		50	3.60	-
20	8.10		-				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	14	19:40				3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1015.0	13.5		Ns	10	R
Z m	T C		S ‰		Z m	T C	S ‰
0	12.60		-		100	2.00	-
10	12.60		-		125	1.60	-
20	12.30		-		150	1.40	-
30	11.90		-		200	1.30	-
50	8.20		-		250	1.30	-
75	3.20		-				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	14	18:30				4	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1015.0	13.0		Ns	10	R
Z m	T C		S ‰		Z m	T C	S ‰
0	13.20		-		100	5.50	-
10	13.10		-		125	3.10	-
20	13.05		-		150	1.70	-
30	12.50		-		200	1.40	-
50	11.10		-		250	1.30	-
75	9.00		-		300	1.30	-

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	14	15 : 30		4		5	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1017.0	13.5		Ns	10	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	11.27	34.36	100	10.48	34.38		
10	11.30	34.38	125	9.00	34.27		
20	10.71	34.38	150	7.59	34.22		
30	10.79	34.38	200	2.59	34.11		
50	10.60	34.40	250	0.66	34.07		
75	10.50	34.38	300	0.34	34.07		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	14	13 : 00		3		4	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1019.0	13.7		Cs	10	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	11.37	34.37	100	5.54	34.13		
10	11.40	24.42	125	3.79	34.07		
20	11.09	34.40	150	2.67	34.09		
30	10.51	24.42	200	1.17	34.07		
50	10.28	34.40	250	0.58	34.05		
75	8.76	13.31	300	0.38	34.07		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	14	10 : 30		3		4	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1020.0	14.0		Cs	7	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	11.68	34.43	100	4.52	34.16		
10	11.70	34.43	125	3.09	34.09		
20	11.51	34.45	150	2.30	34.09		
30	10.81	34.43	200	1.04	34.07		
50	9.89	34.34	250	0.75	34.07		
75	8.98	34.34	300	0.38	34.11		

St. No.	Date	Time	Depth	Water Color.	Water Trans	Wave	Swell
09	13	09 : 30		4		4	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1029.0	14.5		Cs	9	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	12.35	34.49	100	9.69	34.34		
10	11.61	34.43	125	9.45	34.29		
20	10.93	34.42	150	8.47	34.22		
30	10.61	34.43	200	3.83	34.13		
50	10.09	34.38	250	1.49	34.07		
75	9.98	34.33	300	0.63	34.20		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	13	06 : 50		4		1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
		1029.0	13.0				
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	11.30	34.40	100	10.12	34.36		
10	11.27	34.38	125	9.99	34.34		
20	11.13	34.38	150	9.61	34.34		
30	10.60	34.38	200	6.74	34.25		
50	10.31	34.38	250	5.73	34.16		
75	10.19	34.38	300	2.18	34.20		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	13	04 : 30				1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1029.0	12.5				BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	11.07	34.38	100	10.28	34.38		
10	10.75	34.40	125	10.20	34.36		
20	10.73	34.40	150	10.03	34.36		
30	10.58	34.40	200	9.32	34.36		
50	10.53	34.38	250	4.81	34.34		
75	10.31	34.38	300	4.60	34.13		

6월 (June)

조사선 척양호 (Chuk Yang Ho)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	16	07 : 50		5	8	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1012.0	17.0		Cl	3	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	15.98	34.42	30	6.57	34.31		
10	14.62	34.43	50	5.37	34.42		
20	9.68	34.47					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	15	20 : 00				4	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1007.0	18.0		Ns	10	R
Z m	T C	S ‰	Z m	T C	S ‰		
0	16.98	-	100	1.20	-		
10	16.90	-	125	1.20	-		
20	14.20	-	150	0.90	-		
30	7.40	-	200	0.70	-		
50	3.10	-	250	0.60	-		
75	2.40	-					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	15	17 : 25		4	13	3	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1007.0	20.6		Ns	7	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	17.83	34.47	100	1.33	34.20		
10	17.78	34.47	125	0.85	34.20		
20	16.48	34.47	150	0.85	34.34		
30	15.80	34.51	200	0.60	34.25		
50	6.71	34.34	250	0.45	34.24		
75	2.57	34.24	300	0.36	34.25		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	15	15:10		4	16	3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1009.0	21.5		Ns	9	C
Z	T		S		Z	T	S
m	°C		‰		m	°C	‰
0	18.58		34.52		100	6.31	34.40
10	18.44		34.42		125	2.72	34.24
20	17.10		34.67		150	2.22	34.33
30	16.28		34.58		200	1.42	34.33
50	14.37		34.63		250	0.86	34.42
75	9.50		34.65		300	0.68	34.24

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	15	12:40		4	12	3	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1010.0	22.5		Ns	9	C
Z	T		S		Z	T	S
m	°C		‰		m	°C	‰
0	17.98		34.63		100	12.54	34.76
10	17.98		34.60		125	7.85	34.47
20	17.68		34.51		150	4.40	34.33
30	17.35		34.56		200	3.20	34.25
50	17.29		34.74		250	1.07	34.36
75	15.84		34.67		300	0.87	34.25

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	15	10:25		2	20	4	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1010.0	22.0		Ns	10	C
Z	T		S		Z	T	S
m	°C		‰		m	°C	‰
0	18.28		34.68		100	11.45	34.74
10	18.29		34.72		125	10.24	34.51
20	18.09		34.70		150	9.08	34.58
30	16.79		34.81		200	4.32	34.45
50	15.81		34.63		250	2.29	34.25
75	13.23		34.78		300	0.88	34.24

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	15	08 : 00		3	21	3	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1010.0	20.0		cs	10	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	17.90	34.69	100	10.32	34.65		
10	17.92	34.70	125	10.02	34.47		
20	17.30	34.74	150	9.75	34.58		
30	16.01	34.76	200	8.19	34.40		
50	12.90	34.70	250	4.13	34.38		
75	10.39	34.72	300	3.89	34.38		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	14	11 : 35		3	12	4	5
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	10	1012.0	20.1		St	3	B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	17.54	34.70	100	10.07	34.65		
10	17.59	34.70	125	9.83	34.61		
20	16.02	34.69	150	9.82	34.60		
30	15.59	34.58	200	9.18	34.58		
50	13.11	34.70	250	8.10	34.52		
75	10.73	34.70	300	4.31	34.47		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	14	07 : 40		3	23	4	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	3	1012.0	18.5		St	1	B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	17.92	34.74	100	11.03	34.70		
10	17.71	34.72	125	10.37	34.52		
20	16.89	34.74	150	9.93	34.61		
30	16.11	34.70	200	8.52	34.61		
50	13.82	34.74	250	4.35	34.43		
75	11.72	34.72	300	-	34.38		

8월 (August)

조사선 척양호 (Chuk Yang Ho)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
03	2	02 : 40				1	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
W	1	1012.0	23.6				BC				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	23.59	33.53	6.79	0.05	0.06	30	8.20	34.16	6.31	0.03	0.04
10	22.00	33.95	6.69	0.09	0.10	50	5.74	34.16	5.44	0.04	0.08
20	11.01	34.16	6.75	0.02	0.05						

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
04	2	01 : 40				1	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
W	1	1012.0	23.6				BC				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	25.68	33.59	6.72	0.09	0.30	100	1.95	34.22	5.79	0.24	0.05
10	22.58	33.89	5.75	0.08	0.30	125	1.67	34.24	5.76	0.09	0.18
20	16.01	33.87	5.27	0.37	0.06	150	1.06	34.34	6.33	0.21	0.12
30	11.59	34.49	5.43	0.26	0.02	200	1.68	34.24	6.35	0.28	0.25
50	5.11	34.33	5.58	0.08	0.28	250	0.98	34.25	5.91	0.27	0.11
75	2.20	34.22	6.31	0.14	0.14						

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
05	2	05:15				1	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
W	2	1012.0	24.0				BC				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	25.60	33.44	7.05	0.09	0.23	100	1.60	34.27	5.84	0.14	0.12
10	24.14	33.66	6.97	0.09	0.10	125	0.84	34.25	6.31	0.34	0.07
20	20.70	33.96	5.65	0.02	0.02	150	0.69	34.25	5.44	0.19	0.06
30	12.06	33.96	5.70	0.10	0.08	200	0.49	34.27	6.04	-	-
50	7.52	-	5.59	0.23	0.08	250	0.41	34.29	6.63	-	-
75	2.00	34.20	5.80	0.14	0.11	300	0.39	34.29	6.64	-	-

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	1	21:30				2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	1	1012.0	26.0				BC
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	25.74	33.08	100	4.95	34.34		
10	23.22	33.12	125	3.15	34.27		
20	22.10	33.39	150	2.35	34.29		
30	18.13	34.15	200	1.37	34.27		
50	14.45	34.63	250	0.99	34.29		
75	8.10	34.47	300	0.84	-		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
07	1	17:00		3	21	1	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
SW	1	1012.0	26.5		As	9	C				
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	26.49	33.69	6.46	0.02	0.07	100	11.83	34.29	6.78	0.02	0.12
10	23.78	33.69	6.46	0.09	0.12	125	10.18	34.27	6.75	0.05	0.23
20	22.87	33.71	5.65	0.05	0.08	150	9.10	34.00	5.79	0.20	0.12
30	22.40	34.20	6.31	0.02	0.10	200	4.06	34.16	6.31	0.20	0.05
50	22.38	34.22	7.26	0.05	0.32	250	1.88	34.25	5.79	0.33	0.02
75	14.91	34.24	6.73	0.13	0.13	300	1.16	34.25	6.44	0.22	0.06

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	1	14:45		3	20	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	1	1012.0	26.5		As	7	BC
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	26.68	33.53	100	10.59	34.27		
10	23.61	33.33	125	9.94	34.25		
20	22.08	33.93	150	9.82	34.33		
30	17.80	34.20	200	3.77	34.33		
50	14.41	34.28	250	3.29	33.93		
75	11.77	34.40	300	1.77	33.91		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
09	1	13:10		3	20	1	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
SW	1	1012.0	26.5			10	F				
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N
m	°C	‰	‰	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L
0	24.57	32.89	—	0.02	0.18	100	11.17	34.33	6.14	0.10	0.08
10	22.15	33.04	5.89	0.12	0.13	125	10.73	34.25	5.79	0.02	0.02
20	20.76	33.80	5.91	0.10	0.12	150	10.05	34.20	5.57	0.10	0.04
30	16.95	34.20	—	0.11	0.12	200	8.13	34.13	6.47	0.29	0.02
50	14.68	34.33	6.52	0.11	0.16	250	4.10	34.15	6.33	0.13	0.04
75	11.86	34.33	6.31	0.03	0.04	300	2.36	34.05	5.08	0.14	0.07

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	1	09:30		4	20	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force.		Dry	Wet	Type	Amount	
SW	1	1012.0	23.0				F
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	25.98	33.24	100	11.53	34.33		
10	23.21	33.01	125	10.60	34.24		
20	22.11	33.13	150	9.98	33.68		
30	19.30	34.22	200	9.50	34.11		
50	15.52	34.31	250	6.45	34.11		
75	13.24	34.38	300	3.04	34.07		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
11	1	02:30				2	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
E	1	1011.0	23.0				C				
Z m	T °C	S ‰	O ₂ %	PO ₄ -P µg-at/L	NO ₂ -N µg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P µg-at/L	NO ₂ -N µg-at/L
0	23.75	33.31	-	0.14	0.04	100	10.95	34.25	6.31	0.19	0.16
10	22.79	32.95	-	0.14	0.04	150	10.24	34.25	6.05	0.23	0.19
20	21.04	32.88	7.91	0.09	0.02	150	9.90	34.13	6.10	0.23	0.24
30	16.91	34.20	7.89	0.09	0.08	200	9.11	33.98	6.21	0.25	0.24
50	16.85	34.24	7.80	0.14	0.05	250	7.28	33.97	6.50	0.37	0.26
75	13.21	34.33	7.27	0.14	0.18	300	3.07	34.05	6.16	0.32	0.04

10월(October)

조사선 척양호(Chuk Yang Ho)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	14	08 : 10	53	4	17	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	1	1019.0	18.2				B
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	19.67	33.64	30	18.63	33.80		
10	19.42	33.62	50	7.94	33.47		
20	19.40	33.60					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	14	09 : 30		4	18	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	1	1019.0	18.6				B
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	19.51	33.62	100	2.90	34.47		
10	19.50	33.57	125	1.60	34.54		
20	19.49	33.62	159	1.04	34.27		
30	19.45	33.58	200	0.55	34.54		
50	11.36	34.72	250	0.31	34.54		
75	7.00	34.74					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	14	11 : 00		3	20	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1019.0	19.0				B
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	19.58	33.55	100	4.21	34.61		
10	19.53	34.20	125	2.36	34.52		
20	19.50	33.51	150	1.48	34.54		
30	19.50	33.51	200	0.66	34.29		
50	15.45	34.69	250	0.56	34.60		
75	8.58	34.78	300	0.26	34.60		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	14	13:20		3	21	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1019.0	19.5		ci	2	B
Z	T		S	Z	T	S	
m	°C		‰	m	°C	‰	
0	21.22		33.78	100	14.95	34.70	
10	21.11		33.77	125	11.27	34.69	
20	21.07		33.74	150	6.50	34.70	
30	20.99		33.74	200	5.28	34.70	
50	19.59		34.15	250	2.78	34.63	
75	15.72		34.72	300	1.30	34.61	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	14	15:40		3	21	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1019.0	18.2		cu	10	C
Z	T		S	Z	T	S	
m	°C		‰	m	°C	‰	
0	21.02		33.67	100	15.41	34.70	
10	21.02		33.73	125	12.74	34.66	
20	21.01		33.66	150	10.64	34.74	
30	20.86		33.62	200	5.76	34.36	
50	20.59		34.00	250	2.30	34.60	
75	16.72		34.69	300	1.19	34.56	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	14	18:00				2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1019.0	16.4				C
Z	T		S	Z	T	S	
m	°C		‰	m	°C	‰	
0	21.03		33.71	100	13.97	34.67	
10	20.00		33.89	125	10.67	34.69	
20	19.90		33.84	150	9.90	34.76	
30	19.60		33.91	200	6.98	34.69	
50	18.13		34.60	250	3.74	34.70	
75	15.24		34.70	300	1.47	34.60	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	14	20 : 35				2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1019.0	16.0				C
Z m	T C	S ‰	Z m	T C	S ‰		
0	22.04	34.09	100	12.99	34.69		
10	21.65	34.09	125	10.60	34.74		
20	21.53	34.18	150	9.60	34.72		
30	20.63	34.11	200	5.15	34.60		
50	20.19	34.15	250	2.02	34.25		
75	16.59	34.56	300	0.99	34.56		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	14	22 : 55				2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1019.0	16.0				C
Z m	T C	S ‰	Z m	T C	S ‰		
0	20.61	34.11	100	12.77	34.70		
10	20.59	34.07	125	10.34	34.76		
20	20.59	34.15	150	9.02	34.72		
30	20.58	34.09	200	4.75	34.60		
50	20.53	34.15	250	1.95	34.52		
75	15.73	34.69	300	0.85	34.56		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	15	01 : 25				2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1020.0	16.0				C
Z m	T C	S ‰	Z m	T C	S ‰		
0	20.60	34.13	100	14.54	34.56		
10	20.60	34.11	125	11.49	34.72		
20	20.58	34.05	150	9.11	34.74		
30	20.58	34.07	200	5.95	34.60		
50	20.56	34.13	250	2.03	34.58		
75	17.26	34.67	300	0.83	34.54		

12월 (December)

조사선 척양호 (Chuk Yang Ho)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	5	12 : 20		4	17	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1022.0	6.7		C1	6	BC
Z m	T °C		S ‰	Z m		T °C	S ‰
0	13.06		33.50	30		9.04	32.78
10	11.07		33.17	50		8.35	32.63
20	10.27		32.91				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	5	13 : 17		4	18	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1022.0	6.6		C1	4	BC
Z m	T °C		S ‰	Z m		T °C	S ‰
0	13.78		33.46	75		7.55	32.71
10	13.59		33.10	100		7.04	32.76
20	12.82		32.71	125		3.07	33.21
30	10.95		32.90	150		1.98	33.19
50	8.38		32.69				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	5	14 : 10		4	17	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1022.0	6.6		C1	4	BC
Z m	T °C		S ‰	Z m		T °C	S ‰
0	14.26		33.12	100		6.72	33.63
10	13.70		32.74	125		2.63	33.23
20	13.65		33.07	150		1.19	33.20
30	13.65		33.07	200		0.43	33.43
50	11.55		32.99	250		0.31	33.23
75	9.31		33.66	300		0.30	33.23

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	5	16 : 30				1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1022.0	3.2		ci	6	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	15.10	33.35	100	10.17	33.38		
10	14.95	33.13	125	3.83	33.28		
20	14.91	33.10	150	1.70	33.19		
30	14.90	32.75	200	0.89	33.19		
50	11.91	33.20	250	0.30	33.21		
75	10.17	33.33	300	0.29	33.28		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	5	18 : 30				2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1022.0	3.0		ci	7	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	15.41	32.93	100	11.84	33.07		
10	15.96	32.86	125	9.90	33.33		
20	15.83	32.91	150	3.85	33.28		
30	15.81	32.96	200	1.31	33.28		
50	14.60	33.19	250	0.68	33.21		
75	12.35	33.07	300	0.65	33.14		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	5	20 : 30				2	1
Wind		Baro.	Air Temp		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1022.0	2.7				BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	15.61	33.30	100	12.17	33.55		
10	15.63	32.95	125	9.81	33.45		
20	15.61	33.03	150	6.45	33.34		
30	15.61	33.50	200	1.87	33.25		
50	14.95	-	250	0.81	33.24		
75	14.60	33.07	300	0.60	33.25		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	5	23 : 30				2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1022.0	2.0				BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	14.10		32.94	100	12.36		33.55
10	15.12		32.96	125	10.94		33.45
20	15.00		32.99	150	8.15		33.34
30	14.20		33.00	200	4.87		33.25
50	14.17		32.99	250	0.52		33.22
75	14.16		33.03	300	0.47		33.22

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	6	02 : 00				2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1022.0	1.6				BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	13.90		33.05	100	13.20		33.29
10	14.50		33.08	125	9.41		33.53
20	14.19		33.07	150	6.60		33.44
30	14.16		33.07	200	1.15		33.38
50	14.11		33.08	250	0.50		33.24
75	13.37		33.11	300	0.46		33.47

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	6	04 : 35				2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	3	1016.0	1.6				BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	14.00		33.08	100	11.13		33.31
10	14.29		33.06	125	8.62		33.55
20	14.28		33.03	150	7.06		33.47
30	14.26		33.07	200	2.25		33.32
50	14.19		33.05	250	0.60		33.23
75	13.03		33.08	300	0.65		33.43

104 선 해양 관측 성적

OCEANOGRAPHIC DATA, LINE 104

2월 (February)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
04	15	23 : 30	110										
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
		1024.0	5.2										
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	11.66	34.42	7.04	0.42	0.28	11.66	50	11.69	34.59	6.39	0.69	0.35	7.36
10	11.85	34.43	6.65	0.54	0.32	11.04	75	8.60	34.08	6.11	0.91	0.16	19.02
20	11.85	34.43	6.57	0.92	0.32	15.95	100	5.34	33.97	6.66	1.12	0.30	19.02
30	11.74	34.42	6.46	0.60	0.33	7.98							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
05	15	22 : 10	220										
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
		1018.0	7.3										
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	11.48	34.35	7.24	0.75	0.19	11.04	75	11.55	34.36	6.58	0.39	0.16	13.49
10	11.71	34.38	6.68	0.59	0.17	9.20	100	10.64	34.22	6.47	0.48	0.08	10.43
20	11.70	34.38	6.52	0.48	0.16	12.88	125	9.79	34.21	6.16	0.77	0.07	17.18
30	11.70	34.37	6.76	0.46	0.14	8.59	150	5.51	34.04	6.49	1.05	0.09	14.72
50	11.62	34.37	7.14	0.54	0.20	10.43	200	2.06	34.01	6.57	1.12	0.11	23.31

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	15	20 : 05	600				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
		1017.0	9.7				
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	10.33	34.42	125	11.24	34.34		
10	11.60	34.44	150	7.45	33.77		
20	11.91	34.41	200	3.79	33.98		
30	12.03	34.42	250	2.75	34.00		
50	12.10	34.41	300	1.74	33.99		
75	12.10	34.37	400	1.25	34.00		
100	12.11	34.42	500	0.83			

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
07	15	18 : 05	1,050	3	20	2	3						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NE	5	1026.0	8.2				B						
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	10.08	34.45	7.09	0.45	0.12	13.49	125	8.49	34.07	6.19	0.85		20.86
10	11.92	34.40	6.69	0.49	0.28	12.88	150	5.64	34.02	6.29	0.88	0.01	19.63
20	12.01	34.41	6.50	0.46	0.14	10.43	200	2.60	33.98	6.52	0.92	0.02	23.31
30	12.01	34.42	6.65	0.45	0.11	9.82	250	1.26	34.00	6.37	1.00	0.03	23.73
50	12.12	34.42	6.49	0.51	0.11	11.04	300	0.78	33.93	6.09	1.31	0.01	24.54
75	12.00	34.44	6.61	0.46	0.14	14.11	400	0.47	34.02	6.01	1.57	0.07	29.45
100	10.46	34.21	6.35	0.54	0.03	14.11	500	0.36	34.01	6.12	1.42	0.10	24.54

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	15	16 : 20	720	3	15	2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	5	1021.0	5.2				B

Z	T	S	Z	T	S
m	°C	‰	m	°C	‰
0	11.70	-	75	11.80	-
10	11.70	-	100	6.00	-
20	11.70	-	125	2.90	-
30	11.70	-	150	1.50	-
50	11.80	-	200	0.60	-

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	15	14 : 00	2,340	3	14	3	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	5	1021.0	5.0				B

Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	%	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	%	μg-at/L	μg-at/L	μg-at/L
0	10.10	34.39	6.72	0.62	0.13	6.75	125	4.83	34.00	6.89	0.77	0.01	19.02
10	11.53	34.41	6.64	0.69	0.21	9.20	150	3.41	33.98	6.74	0.91	0.03	20.86
20	11.53	34.41	6.44	0.51	0.15	11.04	200	1.70	33.99	6.25	1.19	0.07	—
30	11.30	34.41	7.19	0.75	0.13	12.27	250	0.89	33.99	6.16	1.00	—	23.73
50	11.25	34.39	8.16	0.60	0.10	13.49	300	0.60	34.01	6.05	1.09	0.06	24.54
75	7.69	34.10	6.25	1.08	0.02	15.34	400	0.51	34.01	6.40	1.40	0.02	26.38
100	5.29	34.03	6.18	0.71	0.11	17.79	500	0.49	34.01	6.01	1.32	2.02	36.81

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	15	11:33	1,800	3 \	15	3	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	5	1020.0	4.8				B
Z m	T C	S ‰	Z m	T C	S ‰		
0	12.10	34.40	125	11.59	34.40		
10	11.95	34.42	150	9.21	34.16		
20	11.83	34.42	200	3.29	34.01		
30	11.71	34.38	250	1.54	33.99		
50	11.70	34.41	300	0.85	33.99		
75	11.59	34.39	400	0.67	34.00		
100	11.63	34.40	500	0.53	34.00		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	15	09:10	2,325	3	16	3	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	5	1020.0	5.2				B

Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	12.45	34.15	6.43	1.08	0.10	10.43	125	10.89	34.18	6.67	0.46	0.02	11.04
10	12.44	34.44	6.74	0.45	0.11	7.98	150	10.80	34.17	6.83	0.40	0.01	14.72
20	12.44	34.40	7.33	0.46	0.07	11.66	200	8.14	34.06	6.60	0.80	0.05	15.34
30	12.31	34.34	6.55	0.52	0.02	9.82	250	3.66	33.98	6.40	0.59	0.02	19.02
50	12.31	34.33	6.47	0.60	-	10.43	300	1.54	33.74	6.65	1.45	0.04	21.47
75	11.96	34.27	6.86	0.52	0.07	9.82	400	1.04	33.98	6.50	1.31	0.03	17.79
100	10.51	34.14	7.14	0.60	0.03	13.49	500	0.66	34.00	6.59	1.34	0.02	25.57

4월 (April)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	26	20:40	110				1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1016.5	13.1		Cl	2	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	13.47	34.38	50	8.32	34.11		
10	14.51	-	75	4.12	34.02		
20	14.66	34.31	100	2.35	33.99		
30	11.66	34.29					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	26	18 : 15	220	3	10	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1016.5	14.0		As	7	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	13.97	34.32	100	3.11	34.00		
10	12.72	34.33	125	1.42	33.99		
20	12.60	34.35	150	0.38	34.01		
30	11.17	34.31	200	0.62	34.00		
50	5.91	34.10	218	0.48	34.01		
75	3.74	34.26					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	26	18 : 55	600	3	11	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1017.5	14.1		As	7	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	12.75	34.34	125	1.08	34.03		
10	12.70	34.34	150	0.64	34.01		
20	12.73	34.34	200	0.63	34.02		
30	10.36	34.27	250	0.61	33.73		
50	4.04	34.04	300	0.38	34.00		
75	2.04	34.02	400	0.36	34.02		
100	1.18	34.02	500	0.24	34.02		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	26	14 : 45	1,050	3	11	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1017.5	15.8		As	7	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	15.90	34.14	125	4.77	34.09		
10	15.15	34.31	150	2.83	34.03		
20	14.68	34.49	200	1.03	34.03		
30	14.58	34.49	250	0.56	34.00		
50	14.13	34.49	300	0.51	34.01		
75	13.18	34.49	400	0.40	34.02		
100	10.13	34.37	500	0.33	34.02		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	26	12 : 40	720	3	13	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1017.5	14.1		As	/	BC
Z	T		S	Z	T	S	
m	°C		‰	m	°C	‰	
0	0	14.10	-	100	10.50	-	
10		14.10	-	125	10.20	-	
20		14.10	-	150	9.00	-	
30		14.10	-	200	4.10	-	
50		12.20	-	250	1.60	-	
75		11.50	-	300	0.60	-	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	26	10 : 10	2,340	3	13	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1017.5	12.3		As	8	C
Z	T		S	Z	T	S	
m	°C		‰	m	°C	‰	
0		12.22	34.41	125	10.77	34.33	
10		12.75	34.41	150	10.46	34.30	
20		12.71	34.41	200	5.36	34.06	
30		12.71	34.41	250	1.93	34.02	
50		12.40	34.42	300	1.04	33.99	
75		11.93	34.42	400	0.65	34.02	
100		11.23	34.38	500	0.38	34.03	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	26	08 : 20	1,800	3	10	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	5	1017.5	12.3		As	9	C
Z	T		S	Z	T	S	
m	°C		‰	m	°C	‰	
0	0	12.50	-	100	10.30	-	
10		12.50	-	125	9.50	-	
20		12.50	-	150	9.10	-	
30		12.00	-	200	5.30	-	
50		11.50	-	250	0.60	-	
75		11.20	-	300	0.20	-	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	26	06 : 40	2325	3	19	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1018.0	12.2		As	10	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	12.88	34.41	125	10.57	34.32		
10	12.91	34.43	150	10.36	34.29		
20	12.82	-	200	4.87	34.07		
30	12.76	34.41	250	1.72	34.00		
50	12.70	34.43	300	0.73	34.00		
75	11.83	34.41	400	0.52	34.01		
100	11.05	34.35	500	0.35	34.02		

5월 (June)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	8	20 : 00	100			1	1
Wind		Baro.	Air Temp		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	998.0	17.0	17.2			C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	11.70	34.05	50	1.87	34.07		
10	6.31	34.06	75	1.26	33.99		
20	3.74	34.06	98	1.12	33.99		
30	2.42	33.99					

St. No.	Date	Time	Depth	Water Color	Water Trans.	Wave	Swell
05	8	21 : 10	210			1	1
Wind		Baro.	Air Temp		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	998.2	17.8	17.4			C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	15.58	34.08	75	2.48	34.04		
10	11.09	34.13	100	2.10	34.03		
20	8.23	34.15	125	1.77	33.95		
30	6.55	34.15	150	0.97	33.97		
50	4.80	34.07	200	0.82	33.97		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	8	22:25	600			1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	999.0	20.0	18.2	Cl	4	BC
Z m	T C		S ‰	Z m	T C		S m
0	17.58		34.23	125	5.88		34.09
10	17.50		34.24	150	5.88		34.10
20	16.79		34.22	200	4.06		34.05
30	15.52		34.34	250	1.66		34.00
50	14.42		34.45	300	0.83		33.98
75	12.95		34.42	400	0.47		33.99
100	6.65		34.12	500	0.31		34.00

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	9	01:10	700			1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	999.0	21.2		Cl	1	B
Z m	T C		S ‰	Z m	T C		S ‰
0	18.69		34.34	125	14.05		34.44
10	18.49		34.36	150	9.77		34.23
20	17.18		34.35	200	7.44		34.12
30	16.47		34.37	250	2.51		34.02
50	15.40		34.39	300	1.44		34.06
75	16.63		34.41	400	0.61		34.01
100	15.61		34.48	500	0.38		33.98

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	9	03:50				1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	999.5	19.6		Cl	1	B
Z m	T C		S ‰	Z m	T C		S ‰
0	18.80		-	100	11.50		-
10	18.50		-	125	11.00		-
20	17.50		-	150	8.20		-
30	17.00		-	200	5.70		-
50	15.50		-	250	3.00		-
75	12.50		-	300	2.00		-

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	9	05:40				1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	999.5	20.2		Ci	1	B
Z m	T C		S ‰	Z m		T C	S ‰
0	17.59		34.38	125		9.32	34.20
10	17.53		34.38	150		7.27	34.11
20	16.49		34.41	200		3.45	34.00
30	16.10		34.38	250		1.61	—
50	14.41		34.40	300		0.89	33.99
75	12.21		34.36	400		0.52	34.01
100	10.30		34.32	500		0.35	34.03

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	9	08:15		3	19	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1001.0	20.6		Ci	1	B
Z m	T C		S ‰	Z m		T C	S ‰
0	17.60		34.45	125		9.02	34.14
10	17.63		34.36	150		6.38	34.08
20	16.55		34.38	200		3.06	34.01
30	15.72		34.38	250		1.48	34.00
50	13.34		34.34	300		0.75	34.00
75	10.36		34.27	400		0.51	34.01
100	9.34		34.22	500		0.33	34.02

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	9	10:45		3	20	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1001.5	20.0	17.3	Ci	5	BC
Z m	T C		S ‰	Z m		T C	S ‰
0	17.60		34.33	125		9.38	34.21
10	17.57		34.34	150		7.65	34.11
20	16.49		34.35	200		7.63	34.25
30	16.17		34.36	250		3.73	34.12
50	13.65		34.41	300		2.43	34.01
75	12.85		34.35	400		0.62	34.02
100	11.57		34.26	500		0.34	34.06

8월 (August)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
04	30	07:30	110	2	19	1	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
SW	2	1007.0	18.4	17.6	As	10	C				
Z m	T C	S ‰	O ₂ %	PO ₄ - P μg at/L	SiO ₂ - Si μg at/L	Z m	T C	S ‰	O ₂ %	PO ₄ - P μg at/L	SiO ₂ - Si μg at/L
0	20.34	32.83	6.28	0.37	26.99	50	9.74	34.12	6.09	0.60	25.15
10	20.41	32.99	6.29	0.23	14.72	75	4.72	33.95	6.49	0.91	25.77
20	16.74	33.67	6.10	0.37	25.77	100	2.18	33.92	-	0.91	25.77
30	13.29	34.13	6.01	0.25	12.27						

St. No.		Date		Time		Depth		Water Color.		Water Trans.		Wave		Swell	
05		30		06:20		220		2		11		1		1	
Wind				Baro.		Air Temp.				Cloud				Weather	
Direction		Force				Dry		Wet		Type		Amount			
NW		2		1006.0		23.4		22.2		As		10		C	
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L				
0	20.60	32.73	7.27	0.45	11.66	75	5.39	-	-	-	-				
10	20.62	32.99	6.78	-	-	100	2.72	33.89	6.19	0.82	31.29				
20	15.31	33.87	6.48	0.28	-	125	2.72	33.89	6.20	1.05	33.13				
30	13.41	34.11	6.82	0.48	22.09	150	0.51	33.86	6.19	0.66	38.04				
50	8.53	-	6.19	-	-	200	0.51	33.87	6.98	0.94	31.90				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	30	05:00	600				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	5	1007.0	23.5	21.4	As	6	BC
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	20.36	32.91	125	5.37	33.89		
10	20.65	33.00	150	5.11	34.09		
20	15.97	33.77	200	5.00	33.90		
30	13.75	34.09	250	0.67	33.90		
50	10.86	34.10	300	0.49	33.89		
75	10.15	34.07	400	0.40	33.87		
100	5.40	33.92	500	0.40	33.86		

St. No.	Date	Time	Depth	Water Color	Water Trans	Wave	Swell				
07	30	03:30	1.050								
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
S	4	1007.0	23.4	21.2	As	5	BC				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -S μg-at/L
0	20.20	32.60	6.30	0.14	22.09	125	4.40	33.89	7.17	1.05	35.58
10	21.15	32.58	5.90	0.22	11.04	150	3.11	33.88	7.10	1.20	36.81
20	18.07	33.73	6.68	0.59	25.38	200	1.73	33.89	6.88	1.85	42.95
30	12.77	33.68	6.29	0.72	28.22	250	0.62	33.90	7.17	1.25	46.63
50	9.19	34.07	6.98	0.92	36.20	300	0.40	33.90	7.15	1.26	52.15
75	5.24	33.92	6.64	1.20	37.42	400	0.36	33.90	6.00	1.39	41.10
100	4.43	33.91	6.29	0.99	42.33	500	0.34	33.90	6.61	1.34	34.97

St. No.	Date	Time	Depth	Water Color	Water Trans.	Wave	Swell
08	30	02:10	720				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	6	1007.0	21.4	19.2	As	6	BC
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	21.26	32.35	125	3.16	33.97		
10	21.81	32.33	150	2.53	33.90		
20	19.38	33.14	200	1.15	33.90		
30	18.67	33.85	250	0.52	33.88		
50	10.38	34.09	300	0.52	33.89		
75	8.25	34.01	400	0.52	33.90		
100	5.10	33.92	500	0.27	33.89		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
09	30	10:30	2.342								
		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
SW	4	1007.0	21.2	19.0	As	6	BC				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L
0	22.25	32.17	5.91	0.35	5.52	125	10.81	-	7.09	1.03	31.29
10	22.86	32.06	6.20	0.32	10.43	150	5.42	33.91	7.19	1.29	45.40
20	22.52	33.11	6.19	0.48	11.66	200	4.47	34.10	7.27	0.83	42.33
30	22.48	33.18	6.49	0.79	17.79	250	4.29	33.95	-	1.03	49.69
50	22.38	34.13	6.50	0.75	21.47	300	6.58	33.91	7.06	1.26	54.60
75	17.55	34.11	6.78	1.02	23.31	400	6.41	33.93	7.08	-	-
100	16.01	34.00	7.26	1.06	26.38	500	9.30	33.94	7.18	1.54	60.12

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	29	22:00	1800				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	5	1007.0	22.4	19.6			
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	23.24	32.41	125	8.81	34.06		
10	23.61	32.36	150	4.08	33.88		
20	23.07	32.65	200	1.37	33.90		
30	20.15	33.63	250	1.28	33.91		
50	18.97	33.77	300	0.55	33.91		
75	14.61	-	400	0.46	33.92		
100	12.71	34.17	500	0.40	33.94		

St. No.		Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell			
11		29	19:50	2325							
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
SW		3	1007.0	24.6	20.9						
Z	T	S	O ₂	PO ₄ -P	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	SiO ₂ -Si
m	°C	‰	‰	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L
0	24.27	32.84	5.46	0.17	3.07	125	15.69	34.32	7.27	0.29	0.61
10	24.50	32.81	5.39	0.20	6.14	150	13.70	—	6.19	0.26	4.29
20	24.49	32.81	6.48	0.15	4.29	200	12.22	34.31	6.55	0.22	6.75
30	24.40	32.81	6.29	0.29	6.75	250	11.22	34.12	6.32	0.60	24.54
50	21.87	33.56	6.41	0.17	12.27	300	2.12	33.93	6.39	1.09	32.52
75	17.31	34.08	6.59	0.35	10.42	400	0.81	33.91	5.90	1.32	38.04
100	16.79	34.30	6.90	0.20	8.59	500	0.50	33.92	7.07	1.28	42.95

10월 (October)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	26	21:00	110			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1017.0	16.2	14.5			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	16.08	32.66	50	7.64	34.12		
10	16.83	33.37	75	5.63	34.08		
20	16.68	33.40	100	3.71	34.03		
30	15.10	33.98					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
85	26	21:45	220			1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1016.5	16.7	14.5			B
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	16.47		33.37	75	8.58	34.16	
10	16.80		33.36	100	7.99	34.10	
20	16.50		33.58	125	6.10	34.07	
30	14.38		34.05	150	4.14	33.95	
50	12.65		34.09	200	1.41	33.95	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
86	26	23:20	300			1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1015.5	17.0	14.7			B
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	16.50		33.36	125	4.01	34.01	
10	16.90		-	150	3.70	-	
20	17.03		33.36	200	0.70	33.96	
30	16.90		33.36	250	0.63	33.96	
50	16.80		33.89	300	0.57	33.96	
75	14.50		-	400	0.30	-	
100	6.65		34.01	500	0.26	33.92	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
87	27	01:05	1030			1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1016.0	17.0	14.5			B
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	16.50		-	125	6.60	34.05	
10	16.75		-	150	5.10	34.01	
20	16.80		33.35	200	3.38	-	
30	16.70		33.50	250	1.11	34.02	
50	11.11		34.11	300	1.02	34.01	
75	6.77		34.13	400	0.34	34.01	
100	6.60		34.10	500	0.30	34.11	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	27	03:05	720			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1015.5	16.8	14.5			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	17.10	33.25	125	16.07	34.14		
10	17.58	-	150	9.53	34.06		
20	17.65	33.27	200	3.70	34.01		
30	16.67	33.84	250	1.36	34.00		
50	14.97	34.07	300	0.75	34.00		
75	12.81	34.08	400	0.53	34.01		
100	11.75	34.09	500	0.25	34.04		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	27	05:00	2342			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	4	1016.0	16.5	15.0			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	18.03	33.20	125	10.21	33.34		
10	18.20	33.20	150	8.93	33.23		
20	18.00	33.21	200	2.79	-		
30	16.37	33.18	250	1.70	34.14		
50	15.73	33.18	300	1.28	34.13		
75	12.12	33.19	400	0.24	24.03		
100	11.84	33.25	500	0.20	34.04		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	27	07:00	1800			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	4	1020.0	16.8	15.0			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	19.30	33.39	125	10.65	34.13		
10	18.97	33.31	150	9.78	34.11		
20	18.02	33.37	200	7.95	34.12		
30	17.10	33.35	250	3.09	34.01		
50	15.51	33.36	300	1.25	34.01		
75	12.93	34.09	400	0.60	34.01		
100	11.02	34.14	500	0.25	34.11		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	27	09.00	2325		13	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	4	1020.0	16.7	15.0			B
Z m	T C	S ‰		Z m	T C	S ‰	
0	19.13	33.38		125	10.35	34.16	
10	19.70	33.33		150	8.90	34.20	
20	19.40	33.37		200	5.76	34.09	
30	17.15	33.34		250	3.29	34.02	
50	14.91	33.33		300	2.05	34.01	
75	13.23	33.43		400	0.53	34.03	
100	11.15	34.17		500	0.50	34.05	

12 월 (December)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	11	13:20	110	3	12	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	5	1023.0	9.7	7.5			B
Z m	T C	S ‰		Z m	T C	S ‰	
0	10.30	33.80		50	10.98	33.41	
10	13.08	33.79		75	11.81	33.38	
20	14.41	33.79		100	8.90	-	
30	13.48	33.83					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	11	12:10	220	3	15	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	5	1023.0	9.5	8.0			B
Z m	T C	S ‰		Z m	T C	S ‰	
0	10.14	33.76		75	9.64	33.76	
10	11.32	33.75		100	9.49	33.76	
20	11.79	33.72		125	8.82	34.06	
30	10.72	33.34		150	6.15	33.73	
50	9.75	-		200	3.78	32.97	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	11	10:30	600	3	16	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	5	1023.0	10.0	8.7			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	12.12	33.84	125	8.54	34.01		
10	13.36	33.83	150	7.23	34.04		
20	13.21	-	200	5.05	33.94		
30	12.80	34.25	250	4.01	33.92		
50	10.99	33.65	300	1.08	33.92		
75	9.69	33.50	400	0.80	33.93		
100	9.08	33.69	500	0.55	33.92		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	11	08:50	1.050	3	14	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	4	1023.0	10.2	8.5			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	11.86	33.84	125	5.59	34.09		
10	13.20	33.83	150	3.27	34.06		
20	13.83	33.83	200	2.68	34.04		
30	-	33.85	250	0.91	33.92		
50	13.68	33.90	300	0.88	33.93		
75	11.51	34.17	400	0.74	33.95		
100	7.30	34.02	500	0.49	33.94		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	11	06:50	720			1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	4	1023.0	10.4	8.5			B
Z	T	S		Z	T	S	
m	°C	‰		m	°C	‰	
0	11.62	33.75		125	5.83	34.00	
10	13.07	33.81		150	4.52	34.00	
20	13.57	34.26		200	3.03	34.07	
30	12.30	—		250	1.51	—	
50	11.44	33.87		300	1.09	—	
75	8.27	34.00		400	0.69	33.96	
100		33.81		500	0.43	33.97	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	11	04:40	2340			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1023.0	10.2	9.2			B
Z	T	S		Z	T	S	
m	°C	‰		m	°C	‰	
0	11.09	33.73		125	10.75	34.05	
10	13.54	33.69		150	8.49	33.81	
20	13.81	33.70		200	3.45	34.01	
30	14.94	33.74		250	1.44	33.96	
50	14.07	33.78		300	0.94	33.97	
75	12.56	33.87		400	0.65	33.97	
100	10.91	—		500	0.51	33.98	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	11	02:40	1800			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1024.0	9.8	8.7			B
Z	T	S		Z	T	S	
m	°C	‰		m	°C	‰	
0	12.02	33.77		125	10.54	34.12	
10	14.47	33.75		150	9.24	34.02	
20	13.95	33.72		200	5.50	34.34	
30	14.87	33.73		250	0.95	33.88	
50	15.58	34.15		300	0.92	33.98	
75	15.22	34.34		400	0.89	34.24	
100	13.71	34.26		500	0.52	34.02	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	11	00:30	2325			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1023.0	10.9	9.0			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	14.08	33.70	125	13.32	34.24		
10	15.42	33.69	150	8.02	34.12		
20	15.72	33.71	200	4.11	34.11		
30	15.91	33.71	250	1.11	34.01		
50	15.95	34.01	300	0.64	34.02		
75	14.64	34.01	400	0.50	34.31		
100	15.01	34.01	500	0.46	34.02		

103선 해양 관측 성적

OCEANOGRAPHIC DATA, LINE 103

2월 (February)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell					
04	18	10:10	110	3	12	2	3					
Wind		Baro.	Air Temp.		cloud		Weather					
Direction	Force		Dry	Wet	Type	Amount.						
NE	4	1020.0	8.7		Ns	10	C					
T	S	O	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
°C	‰	‰	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L
11.83	34.49	6.37	0.71	0.41	12.27	50	12.61	34.47	6.46	0.62	0.37	14.11
12.51	34.48	6.49	0.57	0.36	10.43	75	8.63	34.39	6.55	0.85	0.37	18.41
20	12.61	34.47	6.37	0.59	10.43	100	8.28	34.32	7.16	0.65	0.31	19.02
20	12.61	34.48	6.62	0.94	12.88							

Date		Time	Depth	Water Color	Water Trans.	Wave	Swell					
05 18		11:40	205		13	2	3					
Wind		Baro.	Air Temp.		Cloud		Weather					
Direction	Force		Dry	Wet	Type	Amount						
NE	4	1020.0	9.0		Ns	8	C					
T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
°C	‰	‰	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L
11.49	34.47	6.28	0.52	0.30	5.52	75	7.94	34.38	6.72	0.48	0.35	7.98
10	12.43	34.47	7.06	0.63	4.91	100	7.93	34.14	6.45	0.54	0.20	11.04
20	12.57	34.47	6.32	0.62	7.98	125	6.37	34.04	6.30	0.79	0.15	17.79
30	12.61	34.47	6.37	0.74	4.91	150	4.19	34.01	6.44	0.79	0.16	16.56
50	12.41	34.52	7.21	0.52	8.59	200	2.85	24.31	6.27	0.85	0.15	22.09

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	18	13:33	235		13	2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	5	1020.0	9.5		Cl	4	B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	12.73	34.51	75	12.61	34.47		
10	13.51	34.51	100	9.40	34.25		
20	13.61	34.51	125	8.97	34.20		
30	13.61	34.52	150	6.03	34.05		
50	13.50	34.51	200	3.18	34.00		

St. No.		Date		Time	Depth	Water Color.		Water Trans.		Wave		Swell	
07		18		15:30	850			13		2		3	
Wind				Baro.	Air Temp.				Cloud				Weather
Direction		Force			Dry		Wet		Type		Amount		
NE		5		1021.0	9.2				Ns		10		C
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L
0	13.21	34.49	6.49	0.92	0.45	6.14	125	9.47	34.26	5.86	0.71	0.17	12.88
10	13.49	34.50	6.35	1.00	0.46	7.98	150	6.21	—	6.69	0.97	0.11	11.66
20	13.61	34.50	6.27	1.39	0.46	11.66	200	2.49	33.99	6.37	1.22	0.21	17.79
30	13.55	34.51	6.28	1.57	0.49	11.04	250	2.28	34.01	6.20	0.42	0.14	14.72
50	13.52	34.51	6.29	1.62	0.43	—	300	1.04	34.02	6.27	0.32	0.09	18.02
75	12.90	34.46	6.27	0.62	0.33	11.66	400	0.84	34.02	6.18	0.43	0.14	19.63
100	12.19	34.44	6.26	0.79	0.24	12.27	500	0.45	34.03	6.16	0.48	0.15	21.47

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	18	18:00	1980		14	2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	5		9.1		Ns	8	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	11.00	34.42	125	11.51	34.25		
10	12.41	34.42	150	11.51	34.25		
20	12.41	34.42	200	10.91	34.04		
30	12.41	34.43	250	10.15	34.01		
50	12.36	34.43	300	1.32	34.02		
75	12.30	34.41	400	0.74	34.03		
100	11.70	34.32	500	0.51	34.04		

St.-No.		Date		Time	Depth	Water Color.	Water Trans.	Wave	Swell				
09		18		20:30	2150								
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
		1019.8	9.5										
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L
0	10.10	34.29	6.86	0.46	0.19	4.29	125	11.41	34.27	6.48	0.29	0.13	8.59
10	11.40	34.29	6.37	0.51	0.19	5.52	150	11.31	34.28	6.55	0.62	0.16	5.52
20	11.61	34.28	6.46	0.43	0.24	4.91	200	10.80	34.22	6.29	0.85	0.12	9.20
30	11.61	34.27	6.47	0.45	0.19	9.20	250	10.55	34.29	6.50	0.55	0.16	13.49
50	11.56	34.28	6.86	0.59	0.23	7.98	300	1.27	34.27	6.37	0.63	0.15	14.72
75	11.56	34.29	6.44	0.55	0.20	5.52	400	1.12	34.28	7.35	0.59	—	12.27
100	11.51	34.27	6.37	0.57	0.16	—	500	0.43	34.28	6.65	0.45	0.17	16.56

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	18	20:50	1500				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
		1019.0	9.7				
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	11.81	34.38	125	11.56	34.31		
10	12.01	—	150	11.50	34.30		
20	12.11	34.36	200	9.37	34.15		
30	11.91	34.33	250	8.76	34.12		
50	11.81	34.32	300	4.16	34.05		
75	11.71	34.31	400	1.78	34.04		
100	11.66	34.30	500	0.97	34.03		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	19	01:00	2100				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
		1015.0	10.1				

Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	‰ ²	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	‰ ²	μg-at/L	μg-at/L	μg-at/L
0	10.90	34.37	6.37	0.63	0.20	2.45	125	11.40	34.26	6.50	0.55	0.16	11.66
10	11.91	34.40	6.39	0.32	0.15	6.14	150	11.41	34.26	6.40	0.59	0.14	11.04
20	11.91	34.38	6.60	0.46	0.24	8.59	200	11.30	34.15	6.34	0.57	0.16	13.49
30	11.91	34.35	6.50	0.48	0.20	13.49	250	9.42	34.13	6.29	0.74	0.15	11.66
50	11.55	34.28	6.86	0.69	0.15	10.43	300	9.16	34.08	4.28	0.89	0.24	15.34
75	11.51	34.28	6.41	0.57	0.15	8.59	400	6.25	34.13	6.27	0.54	0.16	19.02
100	11.51	34.27	6.35	0.51	0.15	6.75	500	1.37	34.13	6.20	0.55	0.15	20.86

4월 (April)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	25	10:45	110	3	7	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1022.0	12.3		As	10	R
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	13.30	34.27	50	6.08	34.18		
10	12.39	34.28	75	3.35	34.03		
20	12.33	34.30	100	3.35	34.03		
30	11.89	34.30					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	25	12:00	205	3	7	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1022.5	11.2		As	10	R
Z m	T C	S ‰	Z m	T C	S ‰		
0	12.30	34.36	75	4.04	34.07		
10	12.46	34.44	100	3.91	34.03		
20	12.30	34.36	125	3.63	34.19		
30	10.46	34.21	150	2.73	34.08		
50	7.17	34.21	200	1.69	34.03		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	25	13:50	235	3	8	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1020.5	12.1		As	10	R
Z m	T C	S ‰	Z m	T C	S ‰		
0	14.73	34.48	75	12.77	34.47		
10	14.95	34.50	100	8.72	34.28		
20	14.96	34.49	125	2.86	34.05		
30	14.94	34.49	150	2.11	34.03		
50	14.18	34.50	200	1.29	34.38		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	25	15:45	850	3	8	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1020.0	12.3		As	10	R
Z m	T C	S ‰	Z m	T C	S ‰		
0	14.57	34.47	125	11.32	34.28		
10	14.76	34.48	150	8.73	34.16		
20	14.72	34.46	200	5.02	34.19		
30	14.71	34.48	250	1.10	34.02		
50	13.28	34.47	300	0.90	34.01		
75	12.08	34.42	400	0.50	34.02		
100	11.67	34.39	500	0.28	34.03		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	25	18:30	1980	3	9	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1019.0	12.1		As	10	R
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	13.25	34.40	125	11.20	34.35		
10	13.14	34.42	150	10.23	34.25		
20	13.21	34.43	200	7.23	34.14		
30	13.02	34.42	250	2.88	34.02		
50	12.81	34.44	300	2.38	34.01		
75	12.52	34.40	400	1.03	34.01		
100	11.69	34.37	500	0.48	34.01		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
7	25	21:10	2150				1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1019.0	11.9		As	10	R
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	12.53	34.42	125	10.62	34.35		
10	12.93	34.43	150	10.54	34.32		
20	12.91	34.43	200	7.93	34.44		
30	12.88	34.43	250	3.89	34.08		
50	12.40	34.44	300	2.55	34.02		
75	11.81	34.44	400	0.63	-		
100	11.61	34.41	500	0.27	-		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	25	23:45	1800				1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1019.0	11.6		As	8	C
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	12.81	34.45	125	10.77	34.35		
10	13.32	34.47	150	10.57	34.31		
20	13.52	34.46	200	9.75	34.27		
30	13.16	34.45	250	5.99	34.21		
50	12.39	34.42	300	4.77	34.07		
75	12.00	34.44	400	0.70	34.06		
100	11.48	34.40	500	0.44	34.09		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	26	02:30	2100				1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1018.5	11.9		As	10	R
Z m	T °C		S ‰	Z m	T °C		S ‰
0	12.71		34.45	125	10.87		34.33
10	13.41		34.44	150	10.46		34.31
20	13.41		34.44	200	8.08		34.15
30	12.99		34.43	250	4.07		34.09
50	12.49		34.42	300	1.51		34.01
75	12.20		34.43	400	1.10		34.01
100	11.43		34.40	500	0.56		34.02

6월 (June)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	10	07:10	110	3	10	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	5	1004.0	21.0	16.2	Cl	3	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	16.53		34.18	50	3.24		34.06
10	10.83		34.19	75	1.86		34.05
20	7.50		34.21	100	1.19		34.02
30	4.47		34.06				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	10	05:45	205			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	5	1002.5	20.4	16.3	Cl	3	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	18.90		34.20	75	15.83		34.33
10	16.39		34.11	100	13.94		34.35
20	15.67		34.30	125	8.96		34.23
30	14.54		34.34	150	4.62		34.09
50	-		34.33	200	3.18		34.23

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	10	03:30	235			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	5	1002.0	24.2	17.6	Ci	3	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	19.57	34.25	25	15.30	34.30		
10	18.82	33.96	100	11.96	34.31		
20	17.03	34.39	125	6.79	34.16		
30	15.95	34.36	150	2.81	34.03		
50	15.77	34.37	200	1.48	34.01		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	10	01:05				1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	5	1001.0	23.0	18.0	Ci	2	B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	20.01	34.30	125	8.26	34.15		
10	18.90	34.34	150	6.33	34.09		
20	16.15	34.35	200	3.20	34.02		
30	16.81	34.35	250	1.63	33.99		
50	15.60	34.40	300	1.30	34.12		
75	14.89	34.40	400	0.68	34.03		
100	10.69	34.29	500	0.43	34.01		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	9	22:55				2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1001.0	21.2	19.2	Ci	4	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	18.50	-	100	11.30	-		
10	18.50	-	125	10.80	-		
20	18.00	-	150	10.30	-		
30	17.50	-	200	5.90	-		
50	15.00	-	250	2.80	-		
75	11.40	-	300	1.40	-		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	9	20:20				1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1011.5	23.4	21.6	Ci	2	B
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	19.77	34.34	125	10.12	34.37		
10	17.50	34.37	150	8.67	34.18		
20	17.27	34.37	200	4.89	33.95		
30	15.72	34.38	250	5.26	34.00		
50	12.84	34.39	300	3.28	33.99		
75	11.21	34.32	400	0.47	34.01		
100	10.20	34.26	500	0.42	34.02		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	9	17:35		3	22	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1011.5	21.0	19.0	Ci	2	B
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	18.40	34.30	125	9.45	34.22		
10	17.28	34.32	150	7.66	34.12		
20	17.18	34.35	200	3.14	34.01		
30	15.24	34.38	250	1.89	34.02		
50	11.65	34.36	300	0.89	34.00		
75	11.73	34.33	400	0.54	34.01		
100	11.12	34.27	500	0.33	34.02		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	9	15:00		3	20	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	5	1002.5	20.2	18.3	Ci	3	BC
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	17.70	34.27	125	10.02	34.25		
10	17.38	34.32	150	8.54	34.16		
20	16.34	34.37	200	7.82	33.98		
30	15.61	—	250	2.80	34.00		
50	14.35	34.38	300	1.65	34.05		
75	11.86	34.38	400	0.52	34.03		
100	10.42	—	500	0.35	—		

8월 (August)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
04	29	07:25	110	2	11	2	2				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
S	2	1010.0	20.0	17.2	Gi	3	BC				
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L
0	17.57	32.87	6.98	-	-	50	8.17	34.07	6.38	-	-
10	20.10	32.85	-	-	-	75	3.85	33.89	7.29	0.97	23.93
20	18.22	33.40	-	0.43	15.34	100	2.32	33.88	7.27	0.82	21.47
30	13.99	34.15	7.45	0.94	19.02						

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
05	29	08105	200	2	12	1	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
SW	4	1010.0	20.3	17.8	Gi	4	BC				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L
0	19.14	33.18	6.49	0.35	15.95	75	4.99	33.95	6.30	1.06	24.54
10	19.16	33.27	6.69	0.37	12.88	100	2.67	33.92	6.78	1.03	27.61
20	14.32	34.18	6.01	0.94	19.02	125	1.61	33.91	6.88	1.31	27.61
30	13.39	34.21	—	0.86	31.29	150	1.01	33.90	5.90	1.03	31.90
50	8.21	34.10	5.52	0.95	18.41	200	—	—	—	1.40	31.29

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	29	09:25	235	2	12	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1011.0	22.9	19.4	As	6	BC
Z m	T C		SS ‰	Z m	T C		S ‰
0	20.11		33.14	75	2.83		33.93
10	17.82		33.60	100	2.45		33.89
20	13.21		34.17	125	1.70		33.89
30	10.98		34.16	150	1.51		33.89
50	6.96		34.06				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
07	29	11:00	835	2	14	2	2				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
SW	3	1011.0	22.6	19.0	As	6	BC				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L
0	21.73	32.73	6.49	0.43	11.65	125	-	33.90	6.96	1.31	26.38
10	19.58	33.19	5.30	0.45	12.27	150	3.85	33.89	6.79	1.25	25.15
20	13.76	33.20	5.80	0.60	24.54	200	1.64	33.90	7.07	1.22	28.83
30	11.73	34.13	5.25	0.83	25.15	250	0.62	33.91	6.60	1.32	23.93
50	7.56	34.05	5.03	1.25	23.93	300	0.46	33.92	-	1.28	22.70
75	5.29	33.93	6.87	1.31	22.70	400	0.44	-	-	-	-
100	4.75	33.90	-	1.25	22.70	500	0.34	-	-	-	-

St. No.	Date	Time	Depth	Water color.	Water Trans.	Wave	Swell
08	29	13:00		2	12	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1009.0	23.2	19.2	As	6	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	21.34	32.57	125	4.67	33.90		
10	20.77	32.79	150	3.47	33.89		
20	16.80	33.51	200	1.66	33.89		
30	12.16	34.00	250	0.74	33.90		
50	8.70	34.08	300	0.53	33.91		
75	6.50	34.07	400	0.40	33.93		
100	5.45	33.91	500	0.30	33.92		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	29	14:50	2150	2	14	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1009.0	23.4	19.2	As	7	BC

Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L
0	22.33	32.41	5.41	0.25	12.88	125	9.66	34.02	6.10	1.09	20.86
10	22.90	32.47	5.32	0.42	15.95	150	9.65	34.01	6.10	0.72	17.79
20	22.70	32.60	5.90	0.49	16.56	200	9.60	34.05	5.69	0.79	20.86
30	22.65	33.81	5.11	0.68	17.79	250	1.76	33.90	6.35	1.56	24.54
50	15.11	34.02	5.41	0.75	21.47	300	1.44	33.90	-	1.31	23.93
75	10.89	34.13	5.90	0.89	24.54	400	0.83	33.90	5.80	1.22	31.29
100	10.87	34.09	6.08	0.97	25.77	500	0.40	33.92	6.00	1.52	34.97

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	29	16:30	1800	2	11	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1009.0	24.2	19.8	As	6	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	23.10	32.25	125	15.00	34.22		
10	23.85	32.27	150	14.86	34.20		
20	23.70	32.90	200	12.27	34.01		
30	22.37	33.65	250	2.89	33.91		
50	19.33	33.88	300	0.90	34.02		
75	19.03	33.89	400	0.70	33.91		
100	17.05	34.11	500	0.50	33.90		

St.No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
11	29	18:00	2100								
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
S	4	1007.0	23.4	21.2	As	8	C				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L
0	23.65	32.79	5.88	0.34	9.82	125	15.91	34.25	6.14	0.89	13.49
10	24.62	32.76	6.10	0.26	7.98	150	15.25	34.15	6.29	0.91	20.25
20	24.60	32.77	6.19	0.28	9.20	200	4.87	33.94	6.37	1.05	22.70
30	24.53	32.94	5.70	0.35	11.66	250	4.57	33.98	6.33	0.99	25.15
50	21.02	33.67	6.43	0.39	15.34	300	1.49	33.91	6.50	1.25	23.31
75	18.93	33.84	7.07	0.71	12.27	400	0.50	33.91	6.48	1.17	33.74
100	16.55	33.98	6.59	0.63	14.11	500	0.30	33.95	5.94	1.25	30.06

10 월(October)

조사선 지리산(Chi Ri San)

St.No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell	
04	27	23:00	110			1	2	
Wind		Barc.	Air Temp.		Cloud		Weather	
Direction	Force		Dry	Wet	Type	Amount		
SW	2	1021.0	12.0	10.5			B	
Z m	T C		S ‰		Z m	T C		S ‰
0	16.48		33.15		50	12.03		34.01
10	16.50		33.14		75	8.45		34.02
20	15.78		33.12		100	4.39		33.99
30	14.60		33.69					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	27	21:50	200			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1021.5	13.5	10.5			B
Z m	T C		S ‰	Z m	T C		S ‰
0	16.42		33.22	75	13.90		33.94
10	16.45		33.21	100	10.82		33.90
20	16.46		33.21	125	7.00		33.89
30	16.37		33.71	150	5.75		33.89
50	14.70		34.00	198	3.84		33.89

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	27	20:30	235			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	5	1021.0	14.0	11.5			B
Z m	T C		S ‰	Z m	T C		S ‰
0	15.90		33.21	100	10.5		33.98
10	16.03		33.18	125	10.40		33.92
20	16.46		33.19	150	6.32		33.93
30	15.90		33.71	200	2.90		34.03
50	15.50		33.62	230	1.90		33.98
75	11.72		34.00				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	27	19:15	835			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	4	1020.5	14.7	12.5			B
Z m	T C		S ‰	Z m	T C		S ‰
0	14.40		32.86	100	7.65		33.96
10	16.13		33.16	125	5.74		33.91
20	16.58		33.18	150	5.63		33.87
30	16.28		33.33	200	3.30		33.95
50	14.31		-	250	1.85		33.86
75	8.11		33.96				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	27	17:50	130		11	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	4	1020.0	15.0	13.5			B
Z m	T C	S ‰	Z m	T C	S ‰		
0	14.20	33.18	50	15.97	33.64		
10	15.30	33.19	75	9.30	33.90		
20	13.72	33.17	100	4.89	33.36		
30	16.32	33.17	125	4.00	33.89		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	27	16:15	2.150		17	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1020.0	17.0	16.0			B
Z m	T C	S ‰	Z m	T C	S ‰		
0	16.68	33.05	125	7.08	33.91		
10	17.25	33.04	150	3.26	33.87		
20	17.35	33.04	200	1.51	33.86		
30	15.59	33.40	250	0.63	33.85		
50	11.89	33.93	300	0.45	33.85		
75	8.45	34.00	400	0.30	33.87		
100	7.33	-	500	0.30	33.89		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	27	14:15	1.800		19	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1020.0	17.5	16.0			B
Z m	T C	S ‰	Z m	T C	S ‰		
0	17.33	32.96	125	3.50	33.87		
10	17.63	32.93	150	2.12	33.85		
20	17.53	32.91	200	1.16	33.86		
30	16.77	33.40	250	0.78	33.87		
50	15.36	34.04	300	0.50	33.87		
75	11.51	33.99	400	0.45	-		
100	6.25	33.94	500	0.30	-		

St.No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	27	12:20	200		17	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	5	1029.0	16.8	15.5			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	18.42	33.33	125	11.13	34.20		
10	19.37	33.30	150	10.10	34.04		
20	18.45	33.30	200	6.13	34.03		
30	16.38	33.29	250	2.33	34.02		
50	15.03	33.92	300	0.81	34.03		
75	14.56	33.94	400	0.42	34.04		
100	12.31	34.32	500	0.40	34.04		

12 월 (December)

조사선 지리산 (Chi Ri San)

St.No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	10	03:30	110	3	3		
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1024.5	10.5	8.7	Cl	2	B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	13.03	33.74	50	12.21	33.71		
10	12.40	33.71	75	5.43	33.52		
20	12.31	33.76	100	5.31	33.46		
30	12.26	33.73					

St.No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	10	19:40	205	3	17		
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1024.0	10.2	8.7	Cl	1	B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	11.36	33.80	75	11.15	33.81		
10	12.73	33.79	100	10.72	33.82		
20	12.88	33.82	125	3.44	33.92		
30	13.11	33.81	150	7.15	33.99		
50	13.17	33.80	200	5.39	33.97		

St.No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
66	10	11:20	235	3	16	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	4	1023.0	11.0	9.2			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	10.10	33.71	100	10.52	34.02		
10	11.42	33.71	125	8.32	34.04		
20	11.93	33.70	150	6.66	34.01		
30	11.29	33.71	200	5.06	34.02		
50	11.97	33.91	233	3.96	33.93		
75	11.10	33.92					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
67	10	12:50	350	3	15	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	4	1022.0	13.2	11.0			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	11.77	33.79	125	6.14	33.93		
10	12.58	33.76	150	4.18	33.91		
20	12.32	33.77	200	1.93	33.93		
30	12.98	33.76	250	0.80	33.94		
50	12.92	33.76	300	0.67	33.94		
75	11.80	33.76	400	0.48	33.96		
100	9.61	33.91	500	0.45	33.97		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
68	10	15:00	198	3	15	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	5	1022.0	13.5	11.5			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	13.83	33.80	75	12.51	33.75		
10	14.56	33.81	100	12.64	34.27		
20	14.22	33.91	125	11.31	34.14		
30	13.00	33.78	150	3.34	34.02		
50	12.61	33.76	196	5.19	33.99		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	10	17:00	2150	3	13	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	5	1022.0	12.5	10.0			B
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	13.37	33.73	125	8.34	34.03		
10	14.65	33.72	150	4.86	34.03		
20	14.64	33.79	200	2.54	34.25		
30	14.89	34.06	250	1.31	33.98		
50	15.07	34.25	300	1.01	33.97		
75	13.92	34.13	400	0.60	33.98		
100	12.09	34.15	500	0.49	33.98		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	10	19:10	1000			3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	5	1022.0	11.2	9.5			B
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	12.90	33.83	125	11.61	34.23		
10	13.53	33.84	150	7.64	34.09		
20	13.81	33.85	200	3.12	33.96		
30	13.70	33.85	250	1.70	33.96		
50	13.85	33.85	300	0.99	33.97		
75	12.98	34.29	400	0.55	33.98		
100	13.01	34.27	500	0.47	34.22		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	10	21:10	2100			4	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1023.0	11.1	2.2			B
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	12.68	33.69	125	12.31	33.75		
10	15.62	33.73	150	10.55	33.97		
20	16.24	33.74	200	5.99	33.98		
30	16.27	33.77	250	3.13	33.97		
50	16.38	33.74	300	1.67	-		
75	15.64	33.74	400	1.01	33.66		
100	14.20	33.77	500	0.69	33.97		

102 선 해양 관측 성적

OCEANOGRAPHIC DATA, LINE 102

2월(February)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
04	19	13:00	52			3	4						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW	6	1016.0	8.5		Ns	10	C						
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	%	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	%	μg-at/L	μg-at/L	μg-at/L
0	11.70	34.48	6.27	0.39	0.66	7.36	30	13.12	34.58	7.03	0.49	0.73	13.4
10	12.13	34.47	6.23	0.52	0.65	9.20	50	13.03	34.46	6.95	0.31	0.53	19.0
20	13.15	34.46	6.25	0.52	0.60	7.98							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
05	19	16:40	210	3	12	3	3						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW	6	1014.0	8.5		Gi	3	BC						
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	%	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	%	μg-at/L	μg-at/L	μg-at/L
0	12.01	34.42	6.77	0.31	0.54	4.91	75	13.21	34.43	6.50	0.28	0.48	8.59
10	12.00	34.43	6.27	0.35	0.52	6.14	100	12.70	34.43	-	0.25	0.52	11.34
20	13.06	34.43	6.25	0.45	0.45	7.98	125	11.63	34.33	6.54	0.45	0.28	12.27
30	13.31	34.45	6.52	0.22	0.58	11.04	150	6.98	34.12	6.26	0.94	0.17	21.47
50	13.21	34.43	6.23	0.29	0.57	11.66	200	4.59	34.12	6.16	1.06	0.15	21.47

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	19	15:10	420	3	13	3	4
Wind		Baro.	Air Temp		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	6	1014.0	7.5				B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	11.61	34.46	100	12.95	34.43		
10	12.93	34.46	125	4.10	34.05		
20	13.26	34.46	150	3.18	34.00		
30	13.26	34.44	200	2.59	33.99		
50	13.21	34.45	250	0.97	34.00		
75	13.18	34.45	300	0.25	33.99		

St. No.		Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell					
07		19	13:10	1390	3	14	3	4					
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW		6	1015.0	6.0				B					
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	11.71	34.55	6.18	0.32	0.35	8.59	125	13.16	34.51	6.36	0.25	0.24	13.49
10	13.53	-	6.26	0.23	0.41	9.20	150	13.01	34.46	8.04	0.26	0.13	11.66
20	13.66	34.56	6.20	0.26	0.41	14.72	200	6.55	34.15	6.47	0.85	-	24.54
30	13.71	34.56	6.44	0.15	0.41	11.66	250	4.36	34.05	6.93	1.12	0.02	27.61
50	13.71	34.55	7.65	0.20	0.32	10.43	300	1.79	34.03	6.15	1.09	-	25.15
75	13.52	34.54	7.37	0.25	0.37	11.04	400	0.93	34.04	6.29	1.23	0.01	28.33
100	13.31	34.52	7.26	0.35	0.37	10.43	500	0.62	34.08	6.79	1.06	0.02	33.13

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	19	11:15	1530		13	2	3
Wind		Baro.	Air Temp.		Cloud		weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1015.0	12.8				B
Z m	T C		S ‰	Z m	T C		S ‰
0	11.80		—	100	12.30		—
10	12.80		—	125	11.40		—
20	12.80		—	150	11.20		—
30	12.70		—	200	9.50		—
50	12.60		—	250	6.70		—
75	12.20		—				

St. No.		Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell					
09		19	09:00	1880		12	2	3					
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW		5	1013.0	8.3				B					
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	12.22	34.47	6.47	0.46	0.37	8.59	125	11.46	34.36	6.50	0.46	0.16	10.43
10	12.41	34.48	6.70	0.42	0.33	7.98	150	11.45	34.19	6.45	—	0.04	18.41
20	12.41	34.47	6.39	0.39	0.42	9.62	200	10.12	34.06	6.11	—	0.04	16.56
30	12.46	34.47	6.08	0.51	0.33	6.75	250	8.10	34.04	5.91	1.00	0.03	25.15
50	12.46	34.52	6.88	—	0.20	—	300	2.59	34.04	5.81	0.91	0.04	30.06
75	12.21	34.40	6.37	0.37	0.33	7.98	400	1.44	34.05	6.18	1.17	0.10	23.73
100	11.65	—	6.55	0.43	0.39	5.52	500	0.62	—	6.08	0.26	0.17	20.25

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	19	06:30	1440			2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1014.0	9.5				
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	10.23	34.38	125	11.50	34.36		
10	11.50	34.39	150	11.45	34.32		
20	11.54	34.39	200	9.79	34.14		
30	11.72	34.40	250	9.16	34.42		
50	11.59	34.40	300	4.39	34.32		
75	11.54	34.43	400	1.09	34.12		
100	11.51	34.42	500	0.79	34.03		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	19	04:10	1.780				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
		1014.8	9.8				

Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L
0	10.50	34.40	6.67	0.77	0.24	5.52	125	10.60	34.18	6.47	0.65	0.16	14.11
10	11.20	34.40	6.72	0.80	0.24	9.20	150	8.46	34.14	6.00	0.72	0.11	16.56
20	11.81	34.40	6.37	0.60	0.28	10.43	200	4.81	34.05	6.10	1.03	0.15	17.79
30	11.81	34.40	6.49	0.72	0.25	7.98	250	2.70	34.03	6.08	1.17	0.13	20.25
50	11.86	34.54	6.99	0.39	0.33	9.82	300	1.27	34.02	6.16	1.65	0.15	23.73
75	11.81	34.38	6.47	0.52	0.37	9.20	400	0.84	34.04	6.00	1.16	0.17	26.38
100	11.51	34.33	6.36	0.66	0.22	11.04	500	0.68	34.05	5.72	1.17	0.12	26.99

4월(April)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	25	06:40	52	3	8	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	5	1023.0	14.0		Gi	8	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	14.60	34.21	30	11.43	34.25		
10	14.13	34.21	50	9.66	34.20		
20	12.81	34.24					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	25	05:20	210				1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	5	1024.0	13.7		ci	2	B
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	15.10		34.49	75	12.48	34.47	
10	15.10		34.49	100	8.81	34.27	
20	14.94		34.48	125	2.95	34.03	
30	14.94		34.48	150	1.80	34.02	
50	13.07		34.47	200	0.92	34.02	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	25	03:35	700				1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	5	1024.0	13.8		ci	1	B
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	15.08		34.50	125	8.71	34.45	
10	14.78		34.49	150	6.50	34.49	
20	14.79		34.49	200	4.92	34.28	
30	14.64		34.50	250	0.72	34.04	
50	14.49		34.47	300	0.40	34.02	
75	13.60		34.48	400	0.30	34.03	
100	12.84		34.47	500	0.23	34.02	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	25	01:15	1390				1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	5	1024.0	13.7		ci	1	B
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	15.73		34.50	125	8.75	34.28	
10	14.89		34.49	150	4.09	34.03	
20	14.71		34.49	200	4.06	34.03	
30	14.69		34.48	250	1.34	34.02	
50	14.40		34.48	300	0.60	34.03	
75	13.92		34.47	400	0.44	34.02	
100	13.23		34.47	500	0.28	34.04	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	24	23:20	1530				
Wind		Baro.	Air Temp		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
		1023.0	13.1				B
Z m	T C		S ‰	Z m		T C	S ‰
0	15.20		-	100		12.60	-
10	15.20		-	125		11.70	-
20	14.90		-	150		9.70	-
30	14.80		-	200		4.30	-
50	14.40		-	250		3.40	-
75	13.30		-				-

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	24	20:40	1880				1
Wind		Baro.	Air Temp		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	5	1022.0	12.4		Cl	1	B
Z m	T C		S ‰	Z m		T C	S ‰
0	13.08		34.42	125		10.15	34.29
10	13.01		34.43	150		9.76	34.24
20	13.12		34.36	200		7.34	-
30	13.12		34.42	250		4.39	34.04
50	12.96		34.42	300		1.95	-
75	11.24		34.37	400		0.75	-
100	10.57		34.32	500		0.37	-

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	24	18:40	1440	3	10	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1020.0	11.0		As	7	BC
Z m	T C		S ‰	Z m		T C	S ‰
0	13.10		-	75		9.80	-
10	13.10		-	100		9.10	-
20	13.10		-	125		7.50	-
30	12.80		-	150		4.50	-
50	10.70		-	200		1.80	-

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	24	16:10	1780	3	10	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1019.0	11.2		As	10	C
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	13.27	34.50	125	9.84	34.33		
10	13.52	34.48	150	8.40	34.19		
20	13.55	34.50	200	3.43	34.03		
30	13.51	34.49	250	2.44	34.04		
50	13.40	34.49	300	1.27	34.02		
75	12.45	34.47	400	0.72	34.03		
100	11.77	34.43	500	0.56	34.06		

6 월 (June)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	10	10:35	52	3	15	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	1	1008.0	22.3	16.1	Ci	2	B
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	17.41	34.09	30	5.16	34.12		
10	15.92	34.17	50	3.60	34.07		
20	12.28	34.19					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	10	11:40	210	3	19	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	1	1007.0	23.2	18.2	Ci	2	B
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	18.01	34.30	75	11.74	34.53		
10	17.40	34.32	100	7.79	34.12		
20	15.55	34.32	125	2.28	34.04		
30	16.03	34.40	150	1.29	34.04		
50	15.36	34.40	200	0.65	34.04		

St.No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	10	13:05		3	21	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1007.0	25.0	17.2	Gi	4	BC
Z m	T C		S ‰		Z m	T C	S ‰
0	19.46		34.29		125	11.21	34.38
10	19.50		34.25		150	3.39	34.06
20	17.58		34.31		200	1.00	34.05
30	15.94		34.35		250	0.68	34.02
50	15.10		34.40		300	0.58	34.03
75	-		34.40		400	0.37	34.03
100	15.50		34.41		500	0.29	34.05

St.No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	10	15:15		3	22	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	5	1007.0	24.4	19.4	Gi	4	BC
Z m	T C		S ‰		Z m	T C	S ‰
0	19.68		34.23		125	14.79	34.32
10	19.76		34.23		150	7.85	34.25
20	18.79		34.30		200	6.69	34.05
30	17.46		34.36		250	3.12	34.03
50	17.15		34.33		300	2.33	34.06
75	15.66		34.39		400	1.09	34.05
100	15.10		34.31		500	0.30	34.04

St.No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	10	18:50				1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	4	1006.0	22.4	19.2	Gi	4	BC
Z m	T C		S ‰		Z m	T C	S ‰
0	19.50		-		100	14.50	-
10	19.00		-		125	11.90	-
20	18.90		-		150	10.00	-
30	18.50		-		200	4.80	-
50	18.30		-		250	2.10	-
75	15.60		-		300	0.80	-

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	10	20:45				4	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	4	1006.0	20.4	19.2	Cl	4	BC
Z	T		S	Z	T	S	
m	°C		‰	m	°C	‰	
0	18.47		34.36	125	10.33	34.24	
10	17.76		34.36	150	6.33	34.09	
20	16.79		34.38	200	2.04	34.05	
30	15.86		34.40	250	1.01	34.04	
50	12.59		34.34	300	0.56	34.05	
75	-		34.38	400	0.42	34.05	
100	12.20		34.34	500	0.36	34.06	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	10	23:20				4	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1005.5	20.2	19.0	Cl	4	BC
Z	T		S	Z	T	S	
m	°C		‰	m	°C	‰	
0	18.33		34.26	125	9.28	34.31	
10	18.03		34.29	150	6.34	34.06	
20	15.52		34.29	200	2.22	34.04	
30	16.19		34.30	250	0.94	34.04	
50	12.76		34.31	300	0.53	34.04	
75	-		34.30	400	0.43	34.07	
100	11.05		34.27	500	0.38	34.04	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	11	02:00				2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1005.0	19.9	18.1	Cl	3	C
Z	T		S	Z	T	S	
m	°C		‰	m	°C	‰	
0	18.12		34.36	125	6.47	34.11	
10	13.01		34.36	150	5.74	34.07	
20	17.70		34.35	200	2.30	34.15	
30	16.78		34.37	250	1.94	34.15	
50	14.25		34.37	300	1.30	34.15	
75	-		34.35	400	0.47	34.05	
100	12.31		34.39	500	0.29	34.05	

8 일(August)

조사선 지리산 (Chi Ri San)

Station 10111-10112											
August 28, 1964											
St. No.		Date	Time	Depth	Water Color.	Water Trans.		Wave	Swell		
04		28	12:00	52	2	10		2	2		
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
SW		5	1008.0	23.4	21.2	AS		10	C		
Z	T	S	O ₂	PO ₄ -P	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	SiO ₂ -Si
m	°C	‰	%	μg-at/L	μg-at/L	m	°C	‰	%	μg-at/L	μg-at/L
0	20.08	32.26	6.20	0.35	23.31	30	11.21	33.76	6.30	0.91	25.15
10	20.80	-	5.41	-	-	50	7.47	34.03	7.37	-	-
20	15.63	33.49	5.60	-	-						

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
05	28	12:50	210	2	12	2	2				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
NW	4	1006.0	19.2	18.4	As	9	C				
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L
0	20.15	32.03	-	0.75	18.41	75	4.13	33.93	6.78	1.09	24.54
10	21.22	32.27	7.18	0.46	17.79	100	3.36	33.90	6.10	1.12	27.61
20	15.75	33.58	6.68	-	22.09	125	2.28	33.91	7.86	1.17	28.83
30	11.52	33.96	6.38	0.66	15.34	150	1.50	33.90	-	1.16	27.61
50	9.62	34.03	6.00	0.95	24.54	200	0.86	33.90	7.86	-	-

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	28	14:50	700	2	10	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1007.0	19.8	19.0	As	8	C
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	21.25	32.73	125	4.11	33.83		
10	21.10	32.75	150	4.77	34.03		
20	18.87	33.73	200	4.05	33.90		
30	15.55	34.01	250	1.06	33.89		
50	13.93	34.09	300	0.73	33.91		
75	7.05	34.02	400	0.43	33.93		
100	4.29	33.86	500	0.15	33.83		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
07	28	16:50	1390	2	13	1	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
S	6	1004.0	23.8	21.2	As	7	BC				
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L
0	24.60	32.39	6.59	0.17	12.88	125	7.02	34.07	6.82	0.45	-
10	24.54	32.36	6.63	0.23	11.66	150	5.59	33.95	7.10	-	-
20	22.17	33.54	6.59	0.22	13.49	200	4.27	33.92	7.43	0.77	25.15
30	21.09	33.66	6.47	0.20	15.34	250	3.13	34.05	7.86	-	-
50	21.00	33.74	6.50	0.20	18.41	300	2.55	-	7.27	1.46	22.09
75	14.99	34.24	6.18	0.29	21.47	400	0.77	33.93	7.09	1.32	31.29
100	14.39	34.26	6.86	0.31	17.79	500	0.50	33.92	7.67	0.55	-

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	27	23:40	1530				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	5	1001.0	25.4	25.0	As	8	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	25.25	32.84	125	14.66	34.28		
10	25.30	32.86	150	9.92	34.16		
20	25.28	32.39	200	8.71	33.98		
30	23.27	33.89	250	7.87	34.08		
50	19.43	33.86	300	6.92	34.04		
75	16.73	34.26	400	1.24	33.93		
100	16.52	34.30	500	0.39	33.95		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
09	27	22:10	1580			2	3				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
SW	5	1004.0	25.2	24.9	As	8	C				
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L
0	24.72	32.92	6.88	0.25	12.27	125	16.89	33.53	6.49	0.23	17.18
10	24.85	32.89	6.39	0.22	10.43	150	16.10	33.41	6.74	0.15	20.25
20	24.73	32.88	6.50	—	—	200	14.00	34.23	7.47	—	—
30	24.00	33.25	6.99	—	—	250	13.90	34.28	6.10	0.37	23.31
50	20.90	33.80	6.48	0.18	10.43	300	8.43	34.12	6.31	—	—
75	18.07	34.28	7.09	0.18	6.75	400	1.21	33.93	6.29	0.63	27.61
100	17.55	34.32	6.10	0.35	53.37	500	0.32	33.96	6.60	0.94	26.38

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	27	20:10	1440				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	5	1001.3	25.2	24.9	As	7	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	25.02	32.73	125	17.03	34.23		
10	24.99	32.71	150	14.54	34.35		
20	25.05	32.71	200	12.24	34.22		
30	24.94	32.71	250	10.11	34.31		
50	22.58	33.04	300	7.42	34.15		
75	20.10	33.50	400	2.63	33.98		
100	17.78	33.95	500	0.52	33.94		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
11	27	18:45	1780								
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
			1001.3	25.4	24.8	As		10	C		
Z	T	S	O ₂	PO ₄ -P	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	SiO ₂ -Si
m	°C	‰	%	μg-at/L	μg-at/L	m	°C	‰	%	μg-at/L	μg-at/L
0	25.18	32.80	5.70	0.17	7.98	125	17.24	34.36	6.67	0.26	21.47
10	25.02	32.77	6.49	0.26	6.75	150	14.89	34.35	6.79	0.31	18.41
20	25.05	32.78	6.19	0.20	9.82	200	13.72	34.23	6.78	0.17	15.34
30	25.04	32.76	6.29	0.14	9.82	250	9.77	34.22	6.88	0.29	12.27
50	23.47	33.55	6.73	0.23	7.36	300	9.65	34.10	6.77	0.55	25.15
75	20.53	33.76	5.27	0.17	11.66	400	2.22	33.94	6.88	0.86	34.36
100	17.38	34.10	5.10	0.32	12.88	500	0.44	33.95	7.67	0.95	29.45

13월(October)

조사선 지리산(Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	29	09:00	52		10	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1012.0	14.0	13.0	Ci	5	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	15.08	33.14	30	16.23	33.13		
10	16.36	33.13	50	11.71	33.86		
20	16.34	33.11					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	29	09:50	210		11	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1013.0	16.2	13.0	Cl	5	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	15.92	33.12	75	11.54	34.09		
10	16.40	33.10	100	10.95	34.00		
20	16.30	33.32	125	8.16	33.95		
30	15.32	33.52	150	4.97	33.87		
50	14.77	34.00	200	3.00	-		

t. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	29	10:50	700		17	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1012.5	16.7	13.8			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	17.87	33.06	125	4.55	33.86		
10	18.07	33.05	150	2.12	33.86		
20	16.87	33.28	200	1.24	33.87		
30	14.83	33.66	250	0.89	-		
50	14.67	34.13	300	0.80	33.88		
75	9.89	34.03	400	0.38	33.90		
100	5.59	33.94	500	0.33	33.91		

t. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	29	12:05	1390		11	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	3	1011.0	18.4	14.3			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	18.10	33.07	125	5.60	33.87		
10	18.07	33.07	150	2.00	33.87		
20	18.06	33.12	200	1.32	33.89		
30	17.85	33.13	250	0.93	33.89		
50	17.69	33.45	300	0.57	33.89		
75	13.30	33.96	400	0.38	33.89		
100	8.37	33.99	500	0.30	33.90		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	29	14:00	1530		23	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1010.0	21.0	18.0			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	19.31	33.03	125	7.18	33.94		
10	18.67	32.98	150	4.17	33.89		
20	18.63	32.97	200	1.75	33.87		
30	18.55	33.00	250	1.11	33.88		
50	17.05	33.60	300	0.65	33.88		
75	14.55	33.97	400	0.41	33.90		
100	11.59	34.07	500	0.30	33.90		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	29	16:00	1880		16	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1010.0	20.0	16.8			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	21.87	32.87	125	10.49	33.02		
10	20.83	32.74	150	4.81	33.92		
20	20.29	32.73	200	2.11	33.88		
30	18.50	32.75	250	1.47	33.89		
50	17.20	33.53	300	0.77	33.89		
75	15.09	33.02	400	0.42	33.90		
100	13.42	34.19	500	0.30	33.90		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	29	17:50	1440			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	3	1010.0	17.3	14.0			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	19.58	33.14	125	10.76	34.23		
10	19.15	33.05	150	9.13	34.12		
20	19.00	33.01	200	7.46	34.06		
30	18.90	33.96	250	2.13	33.90		
50	17.47	33.92	300	1.30	33.87		
75	15.69	34.05	400	0.52	33.89		
100	12.55	34.18	500	0.42	33.90		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	29	19:30	1780			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	4	1010.0	18.1	15.1			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	20.43	33.27	125	11.32	34.22		
10	20.33	33.25	150	6.94	34.08		
20	20.33	33.27	200	4.90	33.93		
30	20.03	33.26	250	2.00	33.90		
50	19.77	33.37	300	0.92	33.88		
75	16.13	33.77	400	0.69	33.90		
100	15.31	34.24	500	0.39	33.91		

12 월 (December)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	9	15:10	52	3	8	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1023.0	6.5	6.0			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	6.91	33.68	30	11.08	33.12		
10	10.85	33.67	50	11.43	33.67		
20	-	33.66					

St. No.	Date	Time	Depth	Water Color	Water Trans.	Wave	Swell
05	9	14:20	210	3	12	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1023.0	7.0	6.2			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	8.39	33.71	75	11.03	33.67		
10	11.24	33.66	100	11.94	33.65		
20	12.05	33.66	125	11.78	33.64		
30	12.25	33.78	150	11.58	33.64		
50	12.15	33.70	200	8.82	33.70		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	9	13:20	700	3	15	4	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1023.0	7.5	6.3			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	10.07	33.69	125	10.33	33.78		
10	12.78	33.68	150	8.45	34.05		
20	13.23	33.71	200	4.48	33.97		
30	11.29	33.71	250	1.70	33.93		
50	12.11	33.65	300	1.43	33.93		
75	11.67	33.64	400	0.79	33.92		
100	12.07	33.68	500	0.54	33.92		

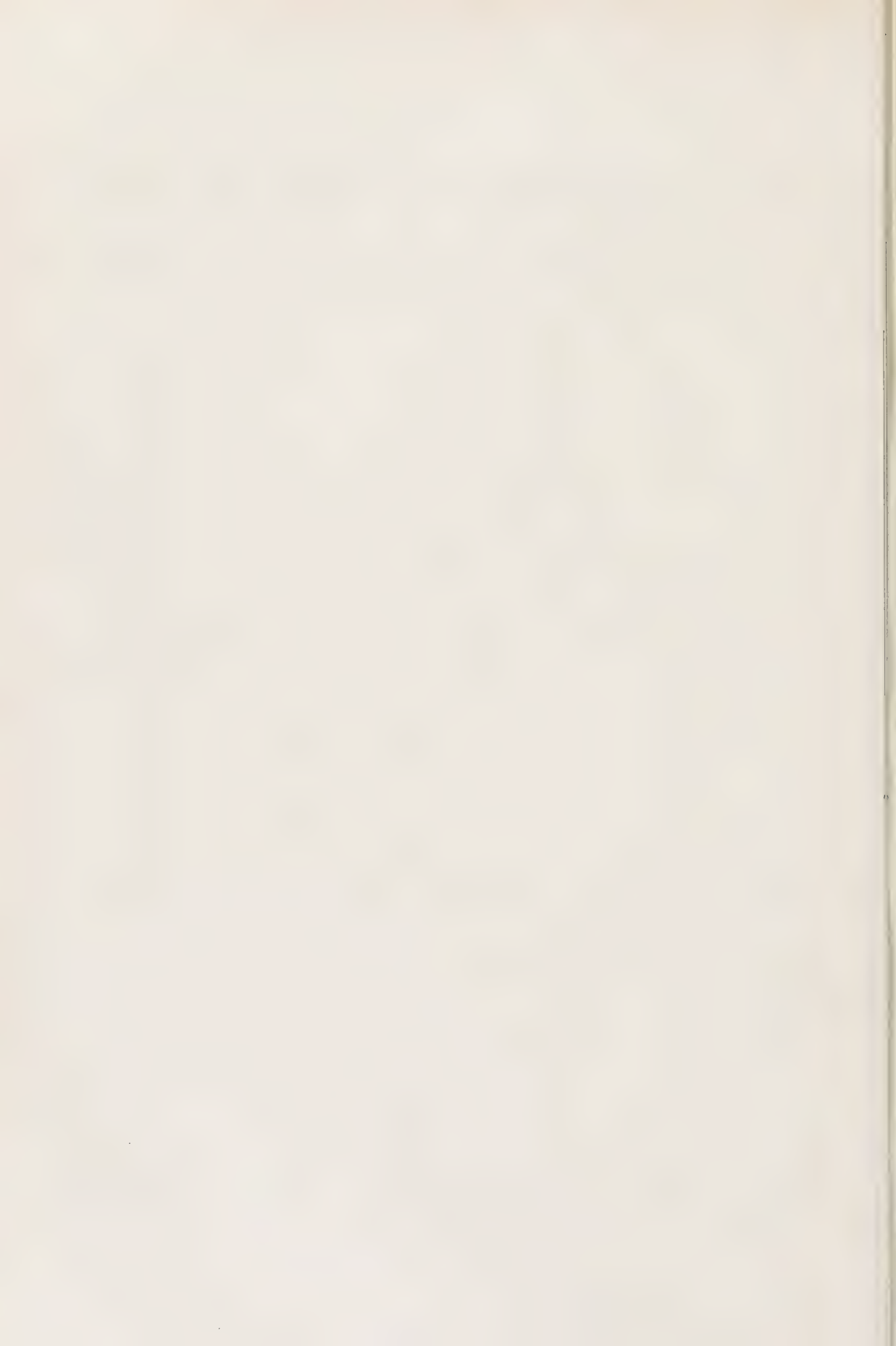
St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	9	11:40	1390	3	13	4	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	4	1023.0	7.3	6.0	Ci	4	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	12.10	33.68	125	11.13	-		
10	13.25	33.60	150	9.88	-		
20	13.45	33.59	200	4.76	-		
30	11.98	33.70	250	2.09	33.89		
50	11.77	33.69	300	1.80	33.89		
75	12.38	33.58	400	1.03	-		
100	12.28	33.72	500	0.71	-		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	9	09:40	1530	3	12	4	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	4	1023.0	8.5	6.4	Ci	5	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	13.83	33.62	125	13.45	33.66		
10	15.68	33.63	150	12.08	33.62		
20	17.07	33.62	200	4.48	-		
30	16.45	33.62	250	1.63	33.89		
50	14.77	34.02	300	1.08	33.90		
75	13.43	33.90	400	0.50	33.91		
100	13.42	34.22	500	0.45	33.92		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	9	07:30	1880			4	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1022.0	9.0	7.5			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	15.58	33.54	125	14.04	34.23		
10	16.53	33.54	150	7.79	34.02		
20	16.45	33.53	200	4.77	33.88		
30	16.22	33.53	250	2.04	33.91		
50	16.01	33.55	300	1.68	33.92		
75	15.66	33.69	400	0.99	33.92		
100	14.67	34.09	500	0.59	33.92		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	9	05:30	1440			4	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1022.0	8.2	7.3			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	15.82	33.60	125	15.00	33.71		
10	16.63	33.58	150	13.17	33.78		
20	16.62	33.58	200	4.07	33.91		
30	16.52	33.59	250	5.19	33.90		
50	15.60	33.67	300	2.40	33.91		
75	15.50	33.74	400	0.79	33.91		
100	15.43	33.69	500	0.60	33.92		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	9	03:20	1780			4	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1022.0	9.6	7.7			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	15.82	33.73	125	15.00	33.82		
10	15.80	33.74	150	14.59	34.22		
20	15.75	33.73	200	6.37	34.09		
30	15.60	33.73	250	3.38	33.91		
50	15.57	33.75	300	1.55	33.94		
75	15.37	33.75	400	0.85	33.91		
100	15.16	33.74	500	0.44	33.92		



남 해 해 양 조 사 성 적

OCEANOGRAPHIC OBSERVATIONS
SOUTHERN WATERS

1 9 7 2

209 신히양관측성적

OCEANOGRAPHIC DATA, LINE 209

2월 (February)

조사선 지리산 (Chi Ri San)

St. No.		Date		Time		Depth		Water Color.		Water Trans.		Wave		Swell	
04		20		15 : 00		54				12		1		2	
Wind				Baro.		Air Temp.				Cloud				Weather	
Direction		Force				Dry		Wet		Type		Amount			
SW		5		1024.0		3.6								B	
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L		
0	11.06	34.44	6.22	0.34	0.40	11.36	50	12.50	34.45	6.24	0.54	0.63	17.79		
10	11.13	34.44	6.20	0.57	0.65	10.43	50	12.35	34.43	7.06	0.55	0.50	18.41		
20	11.21	34.51	6.38	0.59	0.72	15.34									

St. No.	Date	Time	Depth	Water Color.	Water Trans	Wave	Swell
05	20	16 : 10	150		9	1	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	5	1024.0	4.5				

Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	%	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	%	μg-at/L	μg-at/L	μg-at/L
0	11.11	34.52	6.69	0.40	0.43	7.98	75	13.51	34.49	-	0.45	0.55	12.88
10	12.75	34.51	6.93	0.31	0.50	-	100	13.11	34.48	5.11	0.45	0.45	14.11
20	13.67	34.50	6.27	0.34	0.53	9.82	125	12.72	34.41	6.05	0.46	0.24	17.18
30	13.65	34.49	6.69	0.46	0.46	7.98	148	11.87	34.36	6.08	0.46	0.17	17.79
50	13.52	34.49	6.24	0.39	0.53	12.27							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	20	18 : 00	250		11	2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	6	1024.0	4.0				B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	11.53		34.51	100	12.41		34.36
10	12.87		34.51	125	12.21		34.36
20	13.28		34.50	150	12.00		34.33
30	13.30		34.50	200	5.94		34.13
50	13.29		34.49	245	2.53		34.07
75	12.51		34.40				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
07	20	19 : 40	250										
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
		1024.0	3.1										
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	11.65	34.52	6.60	0.49	0.49	7.98	100	12.59	34.45	7.21	0.45	0.33	9.20
10	12.07	34.52	7.18	0.46	0.45	3.68	125	12.81	34.68	7.35	0.40	0.30	13.49
20	13.26	34.52	6.48	0.49	0.41	8.59	150	12.81	34.40	7.55	0.37	0.21	12.85
30	13.55	34.51	6.35	0.52	0.50	9.82	200	12.61	34.33	6.32	0.66	0.15	20.86
50	13.52	34.53	6.24	0.49	0.44	13.49	245	12.43	34.45	6.39	0.48	0.35	17.79
75	13.42	34.50	6.45	0.52	0.41	7.36							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	20	21:50	200			4	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	7	1024.0	5.4				
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	12.51	34.52	75	13.01	34.51		
10	13.07	34.52	100	12.65	34.46		
20	13.38	34.52	125	12.47	34.43		
30	13.45	34.51	150	12.20	34.39		
50	13.61	34.51	195	12.00	34.52		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
09	22	21 : 35	150										
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW	5	1015.0	5.4										
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	10.41	34.49	6.34	0.45	0.33	6.75	75	12.76	34.46	6.42	0.42	0.41	7.98
10	12.52	34.48	6.37	0.39	0.41	7.98	100	12.59	34.50	6.40	0.39	0.42	9.20
20	12.63	34.49	6.39	-	-	-	125	12.01	34.46	6.34	0.43	0.33	13.49
30	12.61	34.50	6.29	0.48	0.34	11.04	145	11.54	34.33	6.21	0.45	0.19	17.79
50	12.71	34.49	6.20	0.35	0.37	9.20							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	22	23 : 33	140				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	5	1018.0	8.2				
Z m	T C	S ‰	Z m	T C	S ‰		
0	11.93	34.53	50	13.52	34.54		
10	13.19	34.54	75	12.70	34.50		
20	13.23	34.55	100	12.62	34.50		
30	13.21	34.54	135	12.56	34.47		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
11	22	01 : 40	140										
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW	5	1015.0	6.5				C						
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	11.13	34.56	6.59	0.55	0.53	9.20	50	13.06	34.52	6.74	0.48	0.37	9.82
10	12.87	34.56	6.70	0.40	0.48	8.59	75	13.08	34.52	6.60	0.57	0.41	6.75
20	13.63	34.56	6.74	0.40	0.49	9.82	100	12.57	34.50	6.67	0.60	0.41	9.20
30	13.52	34.55	6.93	0.49	0.33	9.20	135	12.51	34.43	6.37	0.45	0.27	14.11

4월 (April)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	23	19 : 50	64				I
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1019.0	14.0		Si	3	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	15.95	34.12	30	14.07	34.14		
10	14.18	34.12	50	13.32	34.26		
20	14.07	34.11					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	23	21 : 00	150				1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1018.0	14.0		ci	2	B
Z	T		S	Z	T	S	
m	°C		‰	m	°C	‰	
0	16.23		34.49	75	12.76	34.46	
10	15.64		34.49	100	12.55	34.45	
20	15.12		34.49	125	11.15	34.24	
30	15.01		34.48	147	9.12	34.04	
50	13.49		34.47				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	23	22 : 40	250				1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1018.0	14.0		ci	2	B
Z	T		S	Z	T	S	
m	°C		‰	m	°C	‰	
0	16.12		34.49	100	13.27	34.49	
10	15.63		34.48	125	12.20	34.39	
20	15.40		34.48	150	11.25	34.36	
30	15.20		34.48	200	5.11	34.07	
50	14.66		34.48	247	1.91	34.03	
75	13.97		34.49				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	24	00 : 25	250				1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1018.0	12.6		ci	2	B
Z	T		S	Z	T	S	
m	°C		‰	m	°C	‰	
0	14.60		34.48	100	14.07	34.50	
10	14.55		34.49	125	12.80	-	
20	14.53		34.49	150	10.99	34.41	
30	14.58		34.49	200	2.18	34.06	
50	14.54		34.49	247	0.97	34.03	
75	14.54		34.50				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	24	02 : 35	200				1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1018.0	11.5		Ci	2	B
Z m	T C	S %	Z m	T C	S %		
0	12.77	34.42	75	12.31	34.44		
10	12.76	34.45	100	11.99	34.43		
20	12.71	34.42	125	11.28	34.41		
30	12.70	34.43	150	9.74	34.32		
50	12.46	34.46	198	5.87	34.07		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	24	04 : 45	150				1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1019.0	12.2		Ci	2	B
Z m	T C	S %	Z m	T C	S %		
0	12.51	34.45	75	11.23	34.37		
10	12.71	34.42	100	10.73	34.33		
20	12.57	34.42	125	10.16	34.25		
30	12.50	34.42	148	8.54	34.20		
50	12.17	34.41					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	24	06 : 55	140				1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1019.0	12.0		Ci	1	B
Z m	T C	S %	Z m	T C	S %		
0	12.21	34.39	75	11.48	34.40		
10	12.33	34.40	100	10.90	34.36		
20	12.41	34.40	125	9.96	34.31		
30	12.31	34.42	137	8.94	34.22		
50	12.27	34.39					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	24	10 : 00	140	3	11	2	i
Wind		Baro.	Air Temp.		Cloud		Weath.
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1019.0	12.0		Cl	4	BC
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	13.51	34.44	75	12.80	34.43		
10	13.11	34.45	100	12.15	34.43		
20	13.31	34.43	125	11.02	34.39		
30	13.20	34.43	137	9.34	34.29		
50	13.00	34.43					

6월 (June)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	13	05 : 35	65	3	16	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1004.5	17.2	16.2	Cl	7	BC
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	18.90	34.26	30	14.50	34.30		
10	19.86	34.30	50	11.16	34.47		
20	17.03	34.27	63	8.12	34.30		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	13	06 : 45	140	3	17	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1004.5	17.1	15.2	Cl	8	C
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	18.98	34.14	50	15.05	34.43		
10	19.63	34.14	75	13.60	34.41		
20	18.81	34.23	100	13.23	34.39		
30	17.62	34.38	125	12.90	34.38		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	13	08 : 20	250	3	17	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1005.0	17.0	15.3	Ci	5	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	19.12		34.29	100	12.40		34.33
10	19.25		34.29	125	5.01		34.16
20	19.25		34.29	150	2.88		34.06
30	18.04		34.37	200	0.76		34.04
50	16.22		34.41	245	0.60		34.10
75	15.96		34.43				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	11	18 : 35	250	3	17	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1004.5	19.0	17.8	Ci	3	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	18.70		34.38	100	16.30		34.41
10	18.80		34.39	125	15.47		34.41
20	18.75		34.38	150	15.27		34.39
30	18.80		34.42	200	12.43		34.32
50	17.58		34.40	245	11.09		34.32
75	17.02		34.42				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	11	16 : 00	200	3	20	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1005.0	19.2	18.0	Ci	2	B
Z m	T C		S ‰	Z m	T C		S ‰
0	18.15		34.38	75	16.81		34.42
10	18.15		34.38	100	16.96		34.42
20	18.15		34.38	125	15.77		34.44
30	18.13		34.40	150	13.93		34.43
50	18.13		34.39	195	10.46		34.24

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	11	13 : 50	150	3	17	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1005.5	19.6	18.4	C1	2	B
Z m	T C		S ‰	Z m	T C		S ‰
0	18.09		34.39	75	15.07		34.37
10	18.17		34.30	100	12.61		34.24
20	18.11		34.38	125	12.07		34.17
30	16.67		34.38	145	11.78		34.26
50	15.67		34.39				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	11	11 : 05	140	3	19	4	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	5	1006.0	19.2	18.4	C1	5	B-C
Z m	T C		S ‰	Z m	T C		S ‰
0	17.92		34.36	50	15.66		34.39
10	16.30		34.37	75	12.07		34.29
20	16.08		34.37	100	11.57		34.35
30	16.79		34.38	125	10.31		34.37

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	11	02 : 40	140	3	17	4	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1006.5	20.0	18.2	C1	8	C
Z m	T C		S ‰	Z m	T C		S ‰
0	18.05		34.34	50	15.83		34.31
10	18.00		34.34	75	11.96		34.27
20	17.30		34.35	100	8.58		34.27
30	16.07		34.33	125	5.59		34.06

8월 (August)

조사선 지리산 (Chi Ri San)

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	24	06:00	64			1	1
Wind		Baro.	Air Temp.		Cloud		Weather
rection	Force		Dry	Wet	Type	Amount	
SW	4	1012.5	23.2	22.6	ci	2	B.
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	
0	23.92	32.34	7.47	0.09	-	11.66	
10	23.70	32.58	6.88	0.11	-	7.98	
20	20.20	32.78	6.44	0.15	-	10.43	
30	19.42	34.06	5.90	0.60	-	19.02	
50	12.83	34.83	7.43	0.71	-	22.09	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	24	07:40	150	2	11	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1013.0	26.2	24.4	ci	2	3
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	
0	24.32	32.35	6.19	0.14	—	11.04	
10	24.60	32.39	7.32	0.25	—	11.66	
20	23.15	32.77	6.60	0.28	—	11.66	
30	16.08	33.74	6.37	0.60	—	15.95	
50	12.28	34.19	5.85	0.66	—	18.41	
75	9.66	34.11	6.20	0.63	—	26.99	
100	6.05	33.96	6.78	0.66	—	25.15	
125	5.47	33.94	6.88	—	—	—	
145	4.64	33.90	6.60	0.74	—	25.15	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swel
06	24	08 : 45	250	2	10	1	1
Wind		Baro.	Air Temp.		Cloud		Weath
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1013.0	25.2	24.4	Cl	2	B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	24.89	32.63	100	8.05	34.09		
10	25.02	32.60	125	5.15	33.96		
20	24.92	32.61	150	2.86	33.92		
30	24.64	32.70	200	2.70	34.05		
50	24.62	32.75	245	1.93	33.97		
75	16.06	34.18					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	27	10 : 40	250	2	14	1	1
Wind		Baro.	Air Temp		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1009.5	25.2	23.4	As	9	C

Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L
0	25.05	32.55	6.09	0.25	-	-	100	16.77	34.32	5.65	0.31	-	19.02
10	25.26	32.62	5.70	0.26	-	7.36	125	15.39	34.30	5.33	0.45	-	19.02
20	24.00	33.19	6.00	0.31	-	9.20	150	9.96	34.21	6.05	0.71	-	-
30	20.32	33.67	6.30	0.42	-	12.27	200	1.88	33.95	6.39	-	-	19.02
50	17.78	34.20	5.98	1.5	-	16.95	245	0.75	33.93	6.10	1.09	-	28.22
75	16.89	34.31	5.70	0.66	-	19.02							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	27	12 10	200	2	16	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1007.0	23.2	20.2	As	6	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	25.14	32.99	75	18.32	34.13		
10	24.39	33.00	100	15.38	34.32		
20	24.02	33.23	125	14.39	34.28		
30	23.97	33.40	150	12.32	34.17		
50	21.17	33.74	195	9.11	33.98		

St. No.		Date		Time		Depth		Water Color.		Water Trans.		Wave		Swell	
09		27		14 : 00		150		2		13		1		2	
Wind				Baro.		Air Temp.				Cloud				Weather	
Direction		Force				Dry		Wet		Type		Amount			
SE		4		1006.0		25.2		23.4		As		6		BC	
Z m	T C	S ‰	C ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L		
0	24.72	32.97	6.39	0.25	-	6.14	75	16.91	34.28	5.80	0.46	-	13.49		
10	24.69	32.95	5.70	0.18	-	6.75	100	16.01	34.31	5.11	0.40	-	12.88		
20	24.00	33.31	6.78	0.12	-	7.36	125	14.91	34.34	6.78	0.39	-	14.72		
30	23.43	33.81	5.46	0.18	-	7.36	145	13.27	34.30	6.68	0.48	-	9.82		
50	18.81	34.17	6.11	0.14	-	7.98									

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	27	15 : 22	140	2	15	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1004.5	25.2	23.4	As	7	BC

Z	T	S	Z	T	S
m	C	‰	m	C	‰
0	24.73	33.04	75	18.10	34.32
10	24.70	33.01	100	14.97	34.34
20	24.65	33.03	125	12.30	34.28
30	24.63	33.23	135	11.41	34.26
50	19.09	33.31			

St. No.		Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell					
11		27	16 : 35	140	2	15	1	1					
Wind			Baro.	Air Temp.		Cloud		Weather					
Direction	Force			Dry	Wet	Type	Amount						
			1004.0	24.4	22.4	As	7	BC					
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	24.82	33.10	6.88	0.11	-	6.75	50	19.61	34.11	-	0.22	-	9.20
10	24.63	33.09	6.40	0.18	-	11.04	75	16.11	34.33	6.59	0.40	-	12.27
20	24.58	33.09	5.52	0.17	-	7.36	100	14.68	34.34	6.98	0.32	-	18.41
30	24.54	33.17	5.95	0.26	-	10.43	125	11.98	34.30	6.76	0.22	-	11.66

10월 (October)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	30	08 : 55	64		11	2	1
Wind		Baro.	Air Temp.		Cloud		Weath
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1012.0	18.0	16.5	Cs	2	B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	17.32	33.20	30	16.40	33.18		
10	17.20	33.19	50	16.07	33.74		
20	16.02	33.19	62	13.31	33.92		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	30	07 : 50	150		9	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	5	1012.0	17.5	15.7	Cs	3	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	16.30	33.19	75	7.46	33.97		
10	16.30	33.19	100	6.21	33.92		
20	15.79	33.30	125	3.06	33.88		
30	15.20	33.40	145	2.32	33.87		
50	12.21	33.87					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	30	06 : 30	250			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	5	1012.0	17.5	15.7	Cs	3	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	17.91	32.93	100	11.25	34.00		
10	17.64	32.90	125	7.17	33.84		
20	17.41	32.96	150	4.10	33.90		
30	17.00	32.91	200	3.38	33.87		
50	16.22	33.50	248	1.77	33.89		
75	14.19	34.04					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	30	05 : 00	250			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1011.0	17.0	16.0			B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	18.05		33.06	100	14.76		34.20
10	17.63		33.05	125	13.24		34.19
20	17.53		33.09	150	11.20		34.08
30	17.33		33.61	200	10.29		34.06
50	17.32		33.99	248	9.48		34.17
75	16.21		33.94				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	30	03 : 05	200			1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	4	1011.0	17.5	16.2			B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	20.73		33.46	75	18.32		33.91
10	20.53		33.44	100	17.15		33.70
20	20.00		33.45	125	16.81		34.01
30	19.72		33.53	150	16.45		34.20
50	18.57		33.69	198	12.44		33.78

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	30	01 : 20	150			1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	5	1011.0	18.5	17.0			B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	20.22		33.39	75	18.79		34.07
10	20.20		33.44	100	17.07		34.24
20	20.15		33.41	125	16.20		34.23
30	19.97		33.40	148	14.41		34.25
50	19.75		33.73				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	29	23 : 50	140			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	4	1010.0	18.2	15.0			B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	19.83		33.15	50	19.10		33.10
10	19.73		33.14	75	18.82		33.25
20	19.55		33.15	100	17.97		33.17
30	19.50		33.20	125	17.65		33.14

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	29	22 : 00	140			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	4	1010.0	18.7	16.2			B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	20.48		33.28	50	20.00		33.26
10	20.40		33.26	75	18.98		33.28
20	20.30		33.26	100	18.28		34.04
30	20.30		33.26	125	15.95		34.23

12월 (December)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	8	09 : 20	64	3	10	4	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1023.0	8.0	7.0	Cl	6	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	13.16		33.99	30	12.59		33.75
10	12.91		33.91	50	12.21		33.73
20	12.80		33.88	62	11.00		33.72

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	8	10 : 20	150	3	10	4	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1023.0	8.5	7.2	Ci	7	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	14.67		33.86	75	13.72		34.30
10	14.61		33.86	100	12.91		33.89
20	14.43		33.86	125	12.50		33.98
30	14.14		33.86	148	12.25		34.01
50	13.85		34.27				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	8	11 : 50	250	3	12	4	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1022.0	9.1	7.4	Ci	7	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	14.24		33.85	100	13.32		34.27
10	14.03		33.84	125	12.82		34.11
20	14.41		33.89	150	11.88		33.92
30	14.25		33.87	200	7.15		33.96
50	14.16		33.88	248	4.09		33.95
75	13.82		34.10				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	8	13 : 20	250	3	12	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1022.0	9.1	7.5	Ci	7	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	15.26		33.62	100	15.15		34.32
10	16.02		33.60	125	12.33		34.19
20	16.32		33.61	150	7.20		34.06
30	16.06		-	200	7.03		34.00
50	15.82		33.84	248	3.55		34.10
75	15.40		34.00				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	8	15 : 20	200	3	14	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1021.5	11.5	9.2	Cl	7	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	15.92	33.69	75	15.53	33.70		
10	15.49	33.67	100	15.48	33.71		
20	16.23	33.68	125	15.45	33.70		
30	16.32	33.67	150	15.28	33.67		
50	16.23	33.69	198	15.22	33.70		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	8	17 : 10	150	3	9	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1022.0	10.0	8.5	Cl	7	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	15.99	33.62	75	15.93	33.64		
10	16.56	33.60	100	15.55	33.83		
20	16.56	33.60	125	14.10	33.86		
30	16.32	33.59	148	12.50	34.15		
50	16.06	33.59					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	8	19 : 10	140			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1022.0	9.8	8.0	Cl	9	B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	15.52	33.57	75	16.24	33.57		
10	16.00	33.56	100	16.22	33.56		
20	16.55	33.56	125	15.85	33.72		
30	16.50	33.57	138	15.42	34.15		
50	16.48	33.56					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
11	8	21 : 10	140			4	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N W	5	1022.0	9.8	7.5	C1	9	C

Z	T	S	Z	T	S
m	°C	‰	m	°C	‰
0	15.71	33.74	75	15.06	33.77
10	15.79	33.74	100	15.86	33.70
20	16.10	33.75	125	15.81	33.76
30	16.20	33.78	138	15.46	34.03
50	-	33.79			

208 선 해양 관측 성적
OCEANOGRAPHIC DATA, LINE 208

2월 (February)

조사선 지리산 (Chi Ri san)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	23	18 : 30	70				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
		1018.0	4.5				

Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	C ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	11.59	34.53	-	-	-	-	30	13.34	34.49	6.32	0.45	0.53	9.20
10	12.36	34.49	-	0.46	0.41	6.75	50	13.21	34.50	6.20	0.31	0.41	6.75
20	13.53	34.49	6.47	0.40	0.35	7.36	65	13.21	34.50	6.37	0.45	0.46	7.36

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	23	17 : 05	130		11	3	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1018.0	4.2				B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
	12.03	34.55	50	14.22	34.57		
10	12.71	34.56	75	14.21	34.56		
20	12.72	34.55	100	13.12	34.48		
30	14.54	34.56	125	13.06	34.48		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	23	15 : 35	150	3	10	3	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1018.0	4.0				B

Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	13.32	34.55	6.89	0.42	0.39	7.98	75	14.21	34.56	6.16	0.63	0.37	4.91
10	14.27	34.54	6.39	0.35	0.40	5.52	100	14.07	34.52	6.65	0.39	0.42	4.91
20	14.34	34.55	6.08	0.34	0.40	6.14	125	13.91	34.55	6.94	0.45	0.35	6.75
30	14.32	34.57	6.69	0.60	0.40	8.59	145	13.40	-	6.20	-	-	-
50	14.26	34.58	-	-	-	-							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	23	14 : 00	143	3	9	3	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1018.0	4.5				B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	12.10		34.54	50	14.39		34.55
10	12.96		34.55	75	14.21		34.53
20	14.49		34.55	100	14.03		34.52
30	14.49		34.55	140	14.03		34.52

St. No.		Date		Time		Depth		Water Color.		Water Trans.		Wave		Swell	
05		23		12 : 35		135		3		9		3		4	
Wind				Baro.		Air Temp.				Cloud				Weather	
Direction		Force				Dry		Wet		Type		Amount			
NW		5		1018.0										B	
	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	C ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L		
0	11.85	34.52	6.69	0.51	0.42	4.91	50	12.48	34.53	6.49	0.40	0.41	6.14		
10	12.36	34.53	5.88	0.48	0.39	7.36	75	12.48	34.51	6.29	0.51	0.42	3.07		
20	13.56	34.68	6.26	0.46	0.38	9.20	100	12.46	34.47	6.37	0.42	0.25	11.04		
30	13.53	34.54	6.60	0.59	0.37	6.14	130	12.40	34.47	7.16	0.43	-	6.75		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	23	11 : 02	135	3	11	4	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1018.5	6.8				B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	12.16		34.57	50	13.68		34.55
10	13.68		34.57	75	13.55		34.58
20	14.04		34.57	100	13.46		34.55
30	13.84		34.57	130	13.24		34.52

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
07	23	09 : 30	130	3	10	3	4						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW	5	1018.5	7.0				B						
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L
0	11.62	34.58	6.86	0.54	0.51	4.91	50	14.20	34.58	6.86	0.46	0.50	5.52
10	12.21	34.59	6.67	0.60	0.50	5.52	75	13.14	34.56	6.76	0.42	0.51	4.29
20	14.33	34.58	6.92	0.57	0.55	7.36	100	13.13	34.56	7.05	0.39	0.53	6.14
30	14.23	34.57	7.05	0.48	0.49	3.68	125	13.12	34.55	-	0.39	0.50	9.20

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	23	07 : 50	130	3	10	3	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1018.5	7.0		Ns	10	R
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	12.03	34.57	50	14.36	34.55		
10	14.06	34.57	75	14.34	34.55		
20	14.46	34.57	100	14.24	34.57		
30	14.45	34.55	125	14.13	34.56		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
09	23	06 : 25	130										
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
		1018.5	7.6										
Z	T	S	C ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L
0	11.31	34.55	6.88	0.60	0.47	-	50	14.17	34.55	7.18	0.59	0.50	4.91
10	13.64	34.56	6.74	0.62	0.50	6.14	75	14.13	34.57	6.26	0.48	0.50	5.52
20	14.35	34.56	6.78	0.29	-	6.14	100	14.05	34.55	6.84	0.54	0.49	6.75
30	14.25	34.56	6.94	0.51	0.44	-	125	13.53	34.55	6.93	0.59	0.46	6.14

4월 (April)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	22	18 : 40	70	3	9	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	5	1020.0	11.5		As	10	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	12.83	33.95	30	13.67	34.00		
10	13.69	33.98	50	13.60	34.06		
20	13.67	34.00	65	12.38	34.43		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	22	20 : 20	130				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	5	1020.0	11.3		Cl	2	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	13.51	34.49	50	14.70	34.48		
10	14.43	34.49	75	13.70	34.48		
20	14.87	34.48	100	13.09	34.46		
30	14.86	34.48	125	12.68	34.45		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	22	22 : 10	150				1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	5	1020.0	11.3		Cl	2	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	13.33	34.50	75	14.19	34.49		
10	14.42	34.50	100	13.72	34.48		
20	14.73	34.49	125	13.49	34.48		
30	14.51	34.49	147	12.92	34.47		
50	14.29	34.49					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	22	23:55	143				1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	5	1020.0	11.6		Cl	2	B
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	13.83		34.49	75	14.59	34.49	
10	14.68		34.49	100	13.95	34.50	
20	14.71		34.49	125	12.63	34.49	
30	14.72		34.46	140	13.02	34.49	
50	14.72		34.49				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	23	00:40	140				1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	5	1020.0	10.8		Cl	2	B
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	14.02		34.49	50	14.50	34.47	
10	14.42		34.48	75	14.10	34.47	
20	14.52		34.47	100	14.05	34.49	
30	14.52		34.47	125	13.60	34.49	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	23	02:25	135				1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	5	1020.0	10.5		As	5	BC
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	13.03		34.45	50	12.70	34.44	
10	13.05		34.44	75	12.63	34.43	
20	12.94		34.43	100	12.50	34.42	
30	12.81		34.43	125	11.98	34.43	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	23	04:05	130				1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	5	1020.0	11.9		As	5	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	13.88	34.48	50	14.47	34.47		
10	14.45	34.49	75	13.07	34.44		
20	14.73	34.49	100	12.37	34.43		
30	14.73	34.48	125	12.37	34.41		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	23	05:35	130				1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1020.0	12.0		As	4	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	14.43	34.49	50	14.81	-		
10	14.66	34.50	75	13.60	34.49		
20	14.83	34.50	100	13.01	34.47		
30	14.87	34.50	125	13.00	34.44		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	23	07:15	130	3	9	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1020.0	11.0		As	10	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	13.67	34.45	50	12.74	34.41		
10	13.97	34.45	75	12.71	34.41		
20	13.40	34.45	100	11.73	34.40		
30	13.19	34.43	125	11.03	34.34		

5월 (June)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	14	13:10	70	3	19	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1008.0	10.0		Cc	2	B
Z m	T C		S ‰	Z m	T C		S ‰
0	19.12		-	30	16.60		34.43
10	19.11		34.26	50	14.85		34.50
20	17.90		34.38	65	13.72		34.49

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	14	11:40	130	3	19	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1008.0	21.3	18.2	Ci	2	B
Z m	T C		S ‰	Z m	T C		S ‰
0	19.34		34.23	50	15.29		34.49
10	19.39		34.24	75	14.60		34.50
20	19.20		34.23	100	14.65		34.50
30	17.07		34.38	125	12.74		34.49

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	14	10:02	150	3	18	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1008.0	20.2	18.5	Ci	3	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	18.13		34.12	75	15.78		34.49
10	-		34.11	100	14.78		34.43
20	19.61		34.21	125	14.53		34.44
30	18.32		34.34	145	9.35		34.33
50	17.03		34.41				

t. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	14	08:10	140	3	16	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	5	1008.0	18.3	17.0	ci	4	Bc
Z m	T C		S ‰	Z m		T C	S ‰
0	19.54		34.18	75		16.56	34.49
10	--		34.21	100		14.56	34.48
20	18.64		34.29	125		13.06	34.44
30	--		34.40	137		8.76	34.49
50	17.20		34.42				

t. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	14	06:30	140			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1008.0	18.2	17.0	ci	4	Bc
Z m	T C		S ‰	Z m		T C	S ‰
0	19.21		34.25	75		13.50	34.50
10	19.37		34.25	100		16.51	34.51
20	19.40		34.24	125		15.25	34.51
30	19.30		34.30	137		11.39	34.43
50	18.45		34.43				

t. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	14	04:40	130			1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1008.0	18.1	17.0		4	Bc
Z m	T C		S ‰	Z m		T C	S ‰
0	18.91		34.35	50		17.28	34.48
10	18.80		34.37	75		16.56	34.51
20	18.40		34.39	100		15.66	34.51
30	18.05		34.43	125		14.27	34.49

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	14	03:00	130			1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	4	1008.0	18.0	17.0		2	B
Z m	T C		S ‰	Z m	T C		S ‰
0	19.22		34.33	50	17.07		34.44
10	19.32		34.30	75	15.86		34.46
20	19.08		34.33	100	15.90		34.45
30	18.75		34.40	125	15.15		34.44

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	14	01:10	130			1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	4	1006.5	18.2	17.0		3	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	19.31		34.38	50	17.68		34.41
10	19.33		34.38	75	16.98		34.41
20	19.08		34.38	100	15.65		34.45
30	19.12		34.40	125	15.53		34.46

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	13	23:35	130			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	4	1006.0	18.8	17.0		2	B
Z m	T C		S ‰	Z m	T C		S ‰
0	19.33		34.39	50	16.08		34.45
10	19.50		34.39	75	15.54		34.46
20	20.12		34.37	100	15.46		34.47
30	18.41		34.47	125	15.45		34.48

8 월 (August)

조사선 지리산(Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
01	23	11:40	70	2	11	1	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
NE	4	1016.0	28.4	27.2	As	5	BC				
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L
0	24.05	32.33	6.76	0.31	12.88	30	20.96	32.60	6.82	0.26	10.43
10	23.87	32.28	7.13	0.25	7.98	50	11.58	34.06	6.00	0.74	22.70
20	22.94	32.16	6.02	0.29	6.75	68	4.87	34.02	6.15	1.25	20.86

St.No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	23	12:55	130	2	10	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1017.0	26.4	25.2	As	5	BC
Z m		T C	S ‰	Z m	T C	S ‰	
0		23.24	32.09	50	15.46	33.59	
10		23.19	32.06	75	14.49	34.06	
20		22.68	32.20	100	13.58	33.46	
30		17.81	33.31	125	4.23	33.57	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
03	23	14:30	150	2	16	1	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
NE	4	1015.0	25.2	25.0	As	5	BC				
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L
0	25.42	32.50	5.55	0.25	8.59	75	14.78	34.19	5.36	0.72	17.79
10	25.26	32.57	5.80	0.22	7.98	100	13.80	34.15	5.31	0.86	15.95
20	25.10	32.64	—	0.29	10.43	125	13.70	34.16	5.60	0.75	20.36
30	24.55	32.64	5.29	0.25	12.88	148	11.33	—	—		
50	16.58	33.75	5.80	0.52	11.56						

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	23	15:30	143	2	16	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1014.5	25.1	26.9	As	5	BC
Z	T ^{mp}		S	‰	Z	T	S
m	°C		‰		m	°C	‰
0	26.08		23.79		75	16.07	34.09
10	25.45		32.70		100	16.05	34.21
20	25.55		32.68		125	16.01	34.30
30	25.15		32.59		140	15.08	34.31
50	20.57		33.22				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
05	23	17:40	140	3	16	1	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
NE	3	1014.0	25.0	24.0	As	5	BC				
Z	T	S	O ₂	PO ₄ -P	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	SiO ₂ -Si
m	°C	‰	%	µg-at/L	µg-at/L	m	°C	‰	%	µg-at/L	µg-at/L
	25.74	32.47	6.39	0.29	9.82	75	18.65	33.64	5.90	0.31	11.66
10	25.53	32.42	5.40	0.22	8.59	100	16.26	34.12	5.41	0.60	14.72
20	25.50	32.76	5.32	0.37	7.36	125	15.86	33.11	5.90	0.18	6.75
30	25.41	32.98	6.10	0.29	6.75	138	10.92	33.48	6.31	0.28	11.66
50	22.82	33.20	6.67	0.26	10.43						

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	23	18:00	135			1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1015.0	25.2	23.4	As	4	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	25.40	32.43	50	20.43	33.89		
10	25.35	32.41	75	16.68	34.25		
20	24.67	32.88	100	15.90	34.35		
30	22.88	33.07	125	10.30	34.23		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
07	23	19:00	130		-	2	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
NE	3	1014.0	24.0	21.2	ci	2	B				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L
0	25.60	32.91	5.51	0.17	9.20	50	23.08	33.84	6.39	0.28	7.36
10	25.55	32.84	5.13	0.14	7.36	75	17.91	34.11	6.09	0.45	14.72
20	25.55	32.85	5.90	0.14	9.20	100	15.69	34.38	6.82	0.29	9.82
30	25.00	32.96	6.09	0.15	11.66	125	9.88	34.10	7.01	0.51	14.72

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	23	20:25	130			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	4	1015.0	24.8	21.4	Gi	2	E
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	25.32	32.84	50	25.32	33.22		
10	25.37	32.79	75	17.93	34.34		
20	25.42	33.01	100	-	34.37		
30	25.55	33.06	125	12.91	34.02		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
09	23	21:40	130			2	1				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
NE	4	1015.0	25.2	24.0	Gi	2	B				
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	SiO ₂ -Si μg-at/L
0	25.47	32.70	6.30	0.20	7.36	50	24.95	32.93	—	—	9.82
10	25.32	32.65	6.59	—	—	75	16.20	34.34	7.08	0.35	8.59
20	25.17	32.66	6.50	0.14	13.49	100	12.85	34.32	6.89	0.66	12.88
30	25.10	32.97	7.27	0.15	9.82	125	4.81	34.08	7.27	1.08	25.15

11월 (November)

조사선 지리산 (Chi Ri San,

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	1	11:50	70		7	1	2
Wind		Baro.	Air Temp.		cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	4	1023.0	15.0				B
Z m	T C	S ‰	Z m	T C	S ‰		
0	16.51	33.08	30	16.60	33.49		
10	16.61	33.21	50	16.60	33.86		
20	16.11	33.32					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	1	10:15	130		7	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	5	1023.0	15.4				B
Z m	T C	S ‰	Z m	T C	S ‰		
0	17.18	33.71	50	16.00	33.92		
10	16.22	33.90	75	14.20	33.91		
20	16.10	34.05	100	7.88	33.43		
30	16.60	34.03	125	4.03	-		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	1	08:30	150		9	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	4	1023.0	15.7				B
Z m	T C	S ‰	Z m	T C	S ‰		
0	18.05	33.40	75	15.78	34.00		
10	17.47	33.47	100	11.93	34.01		
20	17.47	33.48	125	5.24	33.92		
30	17.22	33.52	148	3.82	33.93		
50	17.00	33.79					

t. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	1	06:55	143			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	5	1020-0	15.7				B
Z m	T C		S ‰	Z m	T C		S ‰
0	19.00		32.96	75	16.68		34.04
10	18.67		32.89	100	14.98		33.95
20	18.23		33.07	125	11.35		34.04
30	18.00		33.43	140	8.37		34.04
50	17.27		33.66				

t. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	1	05:05	140			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	5	1020-0	16.0	13.2			B
Z m	T C		S ‰	Z m	T C		S ‰
0	20.03		33.13	50	18.68		33.99
10	20.33		33.10	75	18.50		34.28
20	19.78		33.15	100	17.73		34.10
30	19.13		33.93	125	7.90		34.00

t. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	1	03:30	135			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	5	1020-0	16.0	13.2			B
Z m	T C		S ‰	Z m	T C		S ‰
0	20.84		33.17	50	18.50		33.82
10	20.53		33.14	75	18.00		34.19
20	20.38		33.14	100	17.10		34.28
30	18.62		33.19	125	11.32		34.08

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	1	01:50	130			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	3	1021.0	14.5	12.7			B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	20.08		33.08	50	18.67		33.95
10	19.85		33.06	75	18.00		34.08
20	19.83		33.07	100	17.95		34.11
30	19.15		33.18	125	13.95		34.19

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	1	00:10	130			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	3	1021.0	14.0				B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	20.43		33.04	50	19.21		33.66
10	19.63		33.02	75	18.49		34.10
20	19.70		33.09	100	17.87		34.16
30	19.27		33.15	125	14.95		34.16

10월 (October)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	31	22:00	130			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1021.0	15.0				B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	20.03		33.06	50	19.00		33.41
10	19.60		33.07	75	18.14		33.99
20	19.56		33.02	100	18.00		34.09
30	19.29		33.42	125	15.05		34.25

12월(December)

조사선 지리산(Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	7	10:10	70	3	11	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	3	1015.0	14.0	11.5	Cl	3	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	14.06	34.03	30	13.49	33.90		
10	13.91	33.97	50	13.32	33.89		
20	13.83	33.91	68	12.90	33.87		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	7	11:10	130	3	10	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	3	1015.0	14.5	11.5	Cl	3	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	14.60	33.67	50	15.13	33.93		
10	15.64	33.68	75	14.18	34.10		
20	15.50	33.88	100	13.12	34.31		
30	15.30	33.94	125	4.69	34.05		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	7	12:30	150	3	9	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1013.0	13.5	11.0	Cl	4	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	14.99	-	75	14.60	34.09		
10	15.85	33.55	100	12.06	34.21		
20	15.81	33.53	125	6.30	34.07		
30	15.64	33.70	148	4.93	34.06		
50	15.41	34.17					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	7	14:00	140	3	9	4	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1013.0	12.0	10.0	CI	4	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	14.60		33.60	50	15.34		33.95
10	16.73		33.61	75	14.74		34.03
20	15.73		33.61	100	13.88		34.24
30	15.47		33.79	125	10.50		34.16

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	7	15:30	140	3	9	4	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1013.0	12.0	10.0	CI	3	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	14.07		33.68	50	15.19		33.88
10	15.42		33.70	75	15.09		34.35
20	15.23		33.72	100	14.29		34.29
30	15.21		33.74	125	10.31		34.14

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	7	16:50	135	3	9	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1014.0	11.0	10.0	CI	3	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	16.71		33.72	50	16.00		33.77
10	16.64		33.77	75	15.32		33.75
20	16.32		33.76	100	14.95		34.06
30	16.31		33.77	125	14.56		34.40

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	7	18:20	130			5	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1013.0	11.0	9.8	Cl	5	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	17.13	33.69	50	16.42	33.57		
10	16.95	33.72	75	16.33	33.56		
20	16.61	33.71	100	16.10	33.66		
30	16.52	33.69	125	14.89	33.88		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	7	19:30	130			5	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1013.0	10.5	9.7			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	17.92	33.79	50	16.63	33.71		
10	17.83	33.81	75	16.20	33.54		
20	17.65	33.82	100	16.37	33.70		
30	16.73	33.74	125	14.72	33.96		

St. No.	Date	Time	Depth	Water Color	Water Trans.	Wave	Swell
09	7	20:50	130			5	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1013.0	10.6	9.7			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	17.73	33.80	50	17.17	33.76		
10	17.65	33.79	75	16.55	33.86		
20	17.43	33.78	100	16.41	33.81		
30	17.43	33.77	125	14.67	33.82		

207 선 해 양 관 측 성 적

OCEANOGRAPHIC DATA, LINE 207

2 월(February)

조사선 태백산(Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	11	10:35	84	4	9	NW1	NW 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1021.5	6.8				R

	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L
0	13.98	34.28	6.23	0.18	0.97	2.97	30	14.12	34.29	5.73	0.13	0.65	2.16
1	14.06	34.30	6.03	0.77	2.62	2.70	50	14.08	34.29	5.93	0.11	0.14	4.32
2	14.13	34.30	5.73	0.31	1.08	1.35	75	13.52	34.27	5.70	0.18	0.11	4.32

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	11	11:20	90	4	9	N 2	N 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
	3	1021.5	7.0		Ns	10	R
Z	T		S	Z	T	S	
m	°C		‰	m	°C	‰	
0	14.05		34.25	30	13.35	34.23	
10	14.10		34.28	50	13.30	34.22	
20	14.20		34.28	75	13.40	34.17	

St. No.	Date		Time	Depth	Water Color.	Water Trans.	Wave	Swell				
03	11		12:10	110	4	10	N 2	N 2				
Wind			Baro.	Air Temp.		Cloud		Weather				
Direction	Force			Dry	Wet	Type	Amount					
N	2		1021.5	6.7		Ns	7	BC				
T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
°C	‰	‰	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L
14.80	34.30	-	0.25	0.22	1.35	50	14.82	34.30	5.53	0.07	0.65	2.43
14.76	34.44	5.63	0.18	0.11	3.24	75	14.76	34.29	5.73	0.25	0.05	1.89
14.81	34.31	5.53	0.22	1.40	2.70	100	14.56	34.29	5.93	0.16	0.89	0
14.80	34.31	5.53	0.04	1.16	4.32	108	14.31	34.30	5.68	0.29	1.87	0

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	11	13:05	210	4	12	N 3	N 3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	4	1021.7	6.5		Ns	10	R
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	15.13	34.29	75	14.96	34.28		
10	15.11	34.29	100	14.53	34.25		
20	15.23	34.29	125	13.81	34.21		
30	15.21	34.30	150	11.85	34.09		
50	15.16	34.31	200	10.43	34.06		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
05	11	14:10	120	4	12	N 3	N 4						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
N	4	1021.5	6.0		Ns	10	R						
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	14.92	34.25	5.73	0.18	0.08	0	50	14.96	34.30	5.55	0.09	0.62	0
10	14.86	34.25	5.63	0.14	0.16	0	75	14.96	34.31	5.63	0.27	0.05	0
20	15.00	34.30	5.73	0.14	1.40	0	100	14.95	34.30	5.53	0.27	0.68	0
30	14.70	34.29	5.53	0.13	0.43	0	117	14.91	34.31	5.53	0.20	-	2.70

4 월 (April)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	11	03:30	80			S 2	S 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	5	1022.5	10.0				
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	12.41	31.35	30	13.33	34.20		
10	12.28	32.90	50	13.62	34.39		
20	13.48	34.04	75	13.49	34.48		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	11	04:20	85			S 2	S 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	5	1022.5	12.2				
Z m	T °C		S ‰	Z m	T °C		S ‰
0	12.87		34.57	30	13.92		33.35
10	14.60		34.53	50	13.60		34.53
20	14.54		34.51	75	13.13		34.47

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	11	05:20	110			S 1	
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	5	1023.0	11.6				
Z m	T °C		S ‰	Z m	T °C		S ‰
0	13.15		34.57	50	13.30		34.54
10	13.30		34.57	75	12.82		34.52
20	13.15		34.57	100	12.50		34.51
30	13.70		34.56				

st. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	11	06:15	204			S 1	
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	5	1023.0	13.6				BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	14.50		34.60	75	13.35		34.60
10	14.90		-	100	13.94		34.56
20	15.00		34.60	125	13.35		34.57
30	15.04		34.60	150	12.78		34.54
50	15.00		34.59	200	12.13		34.51

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	11	07:00	180			S 1	S 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	5	1024.0					
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	14.65	34.59	75	15.08	34.60		
10	15.29	34.60	100	14.90	34.60		
20	15.14	34.61	125	14.80	34.58		
30	15.00	34.60	150	14.41	34.58		
50	15.15	34.60	175	14.31	34.57		

6 월 (June)

조사선 태백산(Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	14	18:30	50	5	8	NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1		19.8		Cl	4	
Z m	T °C		S ‰	Z m	T °C		S ‰
0.	18.20		33.80	30	15.45		34.38
10	16.55		34.13	50	14.92		34.44
20	16.60		34.30	75	14.62		34.47

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	14	19:20	100			NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1004.0	19.7		Cl	4	BC
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	18.95	34.25	50	15.40	34.38		
10	17.08	34.16	75	14.60	34.48		
20	16.60	34.24	98	14.61	34.51		
30	15.90	34.31					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	14	20:00	110			NE 1	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1004.2	19.0		ci	4	BC
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	19.90	34.25	50	15.15	34.44		
10	19.65	34.29	75	14.65	34.52		
20	18.70	34.33	100	14.70	34.53		
30	17.71	34.37	108	14.65	34.52		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	14	21:05	225			NE 1	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1004.3	19.0		ci	4	BC
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	19.90	33.97	75	16.63	34.48		
10	19.32	34.13	100	15.70	34.52		
20	18.41	34.21	125	15.00	34.56		
30	16.80	34.46	150	14.75	34.54		
50	17.00	34.50	200	13.21	34.48		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	14	22:05	160			NE 1	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1005.0	18.2		ci	5	BC
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	19.81	33.93	75	17.13	34.53		
10	19.80	33.93	100	16.60	34.43		
20	18.22	34.11	125	15.75	34.49		
30	17.50	34.26	150	15.68	34.50		
50	17.68	34.28					

8월(August)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	24	16:45	85	6	4	SW 1	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	1	1010.4	26.6		Gs	7	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	24.86	-	30	16.36	33.53		
10	24.12	32.12	50	9.04	34.17		
20	23.12	32.56	75	8.66	34.20		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	24	17:40	105			SW 1	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1008.3	25.0		Gs	8	C
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	P _H
m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L	
0	26.20	32.54	4.92	0.20	0.65	12.42	8.20
10	25.90	32.45	-	0.16	0.16	10.53	8.25
20	25.21	32.64	4.92	0.16	0.27	39.69	8.30
30	22.91	33.94	5.11	0.20	0.22	10.53	8.30
50	20.80	33.88	5.02	0.32	0.54	6.84	8.22
75	14.88	34.24	4.35	0.54	0.43	15.93	8.28
100	8.29	34.20	4.92	1.28	1.89	17.82	8.10

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	24	19:00	110			SW 1	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1009.5	24.2		Gs	8	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	27.00	32.66	50	17.10	33.90		
10	25.96	32.56	75	14.95	34.09		
20	25.78	32.56	100	7.13	34.17		
30	25.92	32.86					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	24	19:55	215			SW 1	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1009.0	24.5				BC
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	pH
0	26.38	32.44	4.84	0.27	0.19	3.16	8.22
10	26.29	32.41	4.92	0.25	0.27	12.42	8.25
20	26.22	32.41	4.83	0.22	0.19	24.03	8.30
30	26.20	33.44	4.83	0.18	0.22	10.53	8.30
50	19.17	34.15	4.5	0.54	1.94	13.50	8.25
75	15.04	34.37	4.28	0.88	0.35	10.80	8.20
100	14.97	34.44	4.14	0.86	0.27	10.26	8.12
125	14.70	34.44	4.16	0.81	1.76	9.79	8.04
150	4.18	34.43	4.26	0.90	0.10	11.97	8.00
210	3.21	34.07	5.39	-	6.35	-	-

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	24	20:45	160			SW 1	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	1	1009.2	24.7				BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	26.23	32.51	75	22.82	33.99		
10	25.60	32.80	100	20.50	34.21		
20	25.34	32.97	125	15.00	34.42		
30	25.29	33.04	150	10.04	34.28		
50	24.56	33.37					

10월 (October)

조사선 태백산 (Tae Baek San)

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	15	19:50	88			NW 1	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1018.0	21.5				C
Z m	T C	S ‰	Z m	T C	S ‰		
0	18.75	32.93	50	11.07	34.11		
10	18.45	33.05	75	8.28	34.13		
20	16.80	33.61	85	8.13	34.16		
30	15.13	33.98					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	16	19:05	100			NW 1	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1017.0	21.5				C
Z m	T C		S ‰	Z m	T C		S ‰
0	20.10		32.90	50	13.95		34.00
10	19.40		32.78	75	10.51		34.14
20	18.37		33.05	95	7.60		34.14
30	15.63		33.73				

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	16	18:10	115			NW 1	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1017.0	21.5				C
Z m	T C		S ‰	Z m	T C		S ‰
0	19.25		32.66	50	15.80		33.83
10	19.38		32.68	75	14.75		34.20
20	19.10		32.84	100	14.64		34.22
30	18.00		23.34				

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	16	17:10	230			NW 1	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1017.5	21.6		As	9	C
Z m	T C		S ‰	Z m	T C		S ‰
0	20.81		33.07	100	15.10		34.35
10	21.54		33.05	125	14.85		34.34
20	20.95		33.04	150	14.58		34.31
30	20.65		33.11	200	3.17		34.09
50	20.38		33.12	225	2.99		34.06
75	15.25		34.08				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
	16	16:30	160	3	14	NW 1	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1017.4	21.6		As	9	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	21.40	33.03	75	16.55	34.18		
10	21.72	33.09	100	15.45	34.20		
20	21.68	33.14	125	14.76	34.18		
30	20.50	33.22	150	14.50	34.25		
50	18.55	33.93					

12월 (December)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
	25	20:55	83			NE 3	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	5	1025.5	6.8				
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	16.48	34.25	30	17.00	34.24		
10	17.03	34.24	50	15.53	-		
20	16.17	34.25	75	14.28	34.05		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
62	25	20:05	103			NE 3	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
	5	1025.5	6.9				
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	17.15	34.10	50	15.66	34.10		
10	16.93	34.28	75	15.21	34.06		
20	17.36	34.28	100	14.84	34.05		
30	16.95	34.20					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	25	19:25	110			NE 2	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	5	1025.5	6.9				
Z m	T C	S ‰	Z m	T C	S ‰		
0	17.58	-	50	17.17	34.25		
10	17.98	-	75	17.93	34.26		
20	17.64	34.25	100	17.94	34.23		
30	17.93	34.23	108	15.84	34.12		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	25	18:00	220			NE 2	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	5	1025.5	7.0				
Z m	T C	S ‰	Z m	T C	S ‰		
0	17.10	34.16	100	17.79	34.15		
10	17.80	34.17	125	16.21	34.16		
20	17.88	34.18	150	16.96	34.17		
30	17.88	34.17	200	17.82	34.17		
50	17.86	34.17	218	13.52	34.14		
75	17.77	34.17					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	25	17:20	128			NE 2	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	5	1025.5	7.0			10	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	16.29	34.14	50	17.53	34.14		
10	17.50	34.14	75	17.68	34.14		
20	-	34.15	100	17.63	34.13		
30	17.02	34.14	125	17.49	34.11		

206 선 해양 관측 성적

OCEANOGRAPHIC DATA, LINE 206

2월 (February)

조사선 태백산 (Tae Baek San)

St. No.		Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell					
01		12	03:55	58			NW3	NW 3					
Wind			Baro.	Air Temp.		Cloud		Weather.					
Direction	Force	Dry		Wet	Type	Amount							
N		4	1023.8	6.2				C					
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L
0	12.91	34.22	5.98	0.25	0	1.89	30	12.70	34.22	5.88	0.25	0.73	3.51
10	12.91	34.22	5.93	0.20	0.19	0.54	40	12.69	34.22	5.73	0.22	0.27	2.97
20	12.80	34.22	4.03	0.22	0	3.78							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
50	12	02:50	70			NW 3	NW 3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1022.2	5.8				C
Z	T	S	Z	T	S	Z	T
m	°C	‰	m	°C	‰	m	°C
0	14.00	33.48	30	13.19	34.23		
10	14.00	34.25	50	12.69	34.16		
20	13.93	34.28	65	12.17	34.12		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	12	01:20	90			NW 3	NW 3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1021.6	6.0				C

Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L
0	13.49	34.28	5.83	0.09	0	2.97	50	14.23	34.26	-	0.22	1.64	3.24
10	14.30	34.30	5.83	0.23	1.76	2.16	75	14.14	34.24	5.83	0.20	1.16	4.32
20	14.21	34.29	5.83	0.27	0	2.97	87	13.49	34.18	5.65	0.25	1.70	4.05
30	14.27	34.28	5.73	0.25	0.11	3.78							

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	12	00:10	130			NW 3	NW 3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1021.8	6.0				R
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	14.00	-	50	13.94	34.24		
10	14.08	34.29	75	13.88	34.24		
20	14.00	34.31	100	13.50	34.16		
30	13.98	34.26	127	13.32	34.15		

St. No		Date	Time	Depth	Water Color.		Water Trans.		Wave		Swell		
05		11	19:20	124					NW 3		NW 3		
Wind			Baro.	Air Temp.			Cloud			Weather			
Direction		Force		Dry		Wet	Type		Amount				
NW		4	1021.8	6.5						C			
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	15.60	34.33	5.93	0.16	0	2.97	50	15.65	34.32	-	-	-	-
10	15.58	34.32	5.73	0	0.92	5.40	75	15.60	34.33	5.45	0.09	0.16	2.16
20	15.57	34.30	5.43	0	0	4.86	100	15.63	34.33	5.53	0.09	0.08	3.24
30	15.59	34.32	5.53	0.14	0.03	0	121	15.65	34.33	5.53	0.18	0.43	2.43

4 월 (April)

조사선 지리 산 (Chi Ri San)

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	12	04:17	62			SW 3	SW 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1021.0	11.4				BC
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	12.59	34.36	30	13.19	34.42		
10	13.08	34.33	50	13.20	34.42		
20	13.18	34.42					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	12	02:43	70			SW 1	
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1022.0					
Z m	T C	S ‰	Z m	T C	S ‰		
0	14.55	34.10	30	14.00	34.58		
10	13.61	34.43	50	13.15	34.56		
20	13.98	34.57	65	13.44	34.56		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	12	01:40	92			SW 2	SW 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1022.0	13.8				BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	14.36	34.57	30	14.00	34.57		
10	14.18	34.60	50	14.00	34.57		
20	14.13	34.58	75	13.61	34.55		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	12	00:30	108			SW 1	
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1023.0	15.0				BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	14.40	34.57	50	13.62	34.55		
10	14.00	34.58	75	13.33	34.54		
20	14.00	34.57	100	12.94	34.52		
30	13.82	34.56					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	11	20:40	130				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	5	1024.5	14.5				B
Z m	T C	S ‰	Z m	T C	S ‰		
0	15.50	34.60	50	14.61	34.60		
10	14.93	34.61	75	15.80	34.59		
20	14.94	34.50	100	12.71	34.54		
30	14.88	34.58	125	12.70	34.54		

6월 (June)

조사선 태백산 (Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	12	07:35	62	5	5	S 1	S 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	1	997.0	18.5		As	7	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	17.10	33.98	30	16.22	34.02		
10	16.50	34.05	50	16.11	34.15		
20	16.30	34.10	60	15.23	34.19		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	12	08:30	70	4	9	S 1	S 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	997.5	18.5		As	10	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	18.04	33.75	30	17.20	34.37		
10	18.05	33.97	50	16.40	34.31		
20	17.78	34.24	60	14.60	34.44		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	12	09:35	94	4	8	S 1	S 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1007.8	21.3		As	10	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	18.05	34.16	50	16.70	34.36		
10	18.80	34.17	75	16.56	34.45		
20	18.45	34.25	90	14.53	34.47		
30	18.10	34.31					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	12	10:40	110	3	10	S 1	S 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	1	1007.8	21.3		As	9	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	18.30	34.23	50	15.32	34.39		
10	18.80	34.20	75	14.90	34.52		
20	18.63	34.22	100	14.90	34.54		
30	18.35	34.24	108	14.90	34.53		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	12	13:30	130	2	17	NW 1	NW 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1008.0	20.2		As	7	B C
Z m	T C	S ‰	Z m	T C	S ‰		
0	19.45	34.15	50	19.33	34.14		
10	19.34	34.14	75	18.28	34.37		
20	19.40	34.13	100	17.30	34.51		
30	19.34	34.15	125	16.18	34.48		

8월 (August)

조사선 지리산 (Chi Ri San)

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	17	10:20	60	5	11	SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1014.0	26.6		Cu	1	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	25.40	32.24	30	16.20	33.85		
10	23.68	32.51	50	14.98	34.26		
20	20.51	33.13					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	17	11:30	75			SE 1	SE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1014.5	27.8		Cu	2	B
Z m	T °C	S ‰	O ₂ %	PO ₄ -P µg-at/L	NO ₂ -N µg-at/L	SiO ₂ -Si µg-at/L	PH
0	26.55	32.67	5.11	0.13	0.68	11.07	-
10	23.60	32.76	5.34	0.27	1.16	9.18	-
20	22.25	33.02	5.20	0.18	0.32	10.89	-
30	17.18	33.74	4.54	0.56	0.81	15.12	8.28
50	14.58	34.32	4.43	0.68	0.68	15.12	8.18
70	14.52	34.36	4.45	0.59	0.54	16.20	8.16

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	17	12:45	105	2	22	SE 1	SE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1015.0	28.6		St	2	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	26.40	32.45	50	16.97	33.83		
10	23.28	32.62	75	14.50	34.35		
20	23.35	32.83	100	14.49	34.34		
30	18.85	33.23					

Stn	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
34	17	14:00	105	2	22	SE1	SE2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1015.2	29.3		Cl	2	B
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	pH
0	27.15	32.04	4.73	0.20	0.24	13.50	8.22
10	25.84	32.04	4.94	0.94	0.27	11.61	8.30
20	25.41	32.07	4.92	0.23	0.24	6.75	8.30
30	23.78	32.47	5.30	0.32	1.42	10.53	8.28
50	20.30	33.21	5.11	0.85	0.62	9.99	8.26
75	17.83	33.72	4.71	0.41	1.00	11.61	8.16
100	14.95	34.26	4.39	0.76	1.13	13.50	8.30

Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	17	17:00	150	4	25	SE 1 SE 2
Wind		Baro.	Air Temp.		Cloud	
Direction	Force		Dry	Wet	Type	Amount
SE	2	1014.7	30.0		Gc	3 B C
Z	T	S	Z	T	S	
m	°C	‰	m	°C	‰	
0	27.62	32.01	75	18.75	34.00	
10	26.04	31.90	100	14.75	34.35	
20	25.76	31.95	125	14.59	34.39	
30	22.27	32.99	145	14.57	34.39	
50	20.90	33.72				

10월 (October)

조산산 태백산 (Tae Baek San)

Time	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	15	02:15	65			SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1013.6	15.2				C
Z m	T °C		S ‰	Z m	T °C		S ‰
0	18.02		33.31	30	15.31		33.99
10	17.61		33.41	50	15.19		34.06
20	16.65		33.67	60	14.90		34.08

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	15	03:10	70		SE 1		
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1		17.8				
		1014.5					C
Z m	T C	S ‰	Z m	T C	S ‰		
0	19.03	32.93	30	15.92	34.06		
10	19.05	32.87	50	14.16	34.03		
20	16.90	33.54	68	13.90	34.04		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	15	04:30	95			NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2		17.4				
		1013.4					C
Z m	T C	S ‰	Z m	T C	S ‰		
0	19.05	32.94	50	14.40	33.97		
10	18.84	32.99	75	14.31	34.05		
20	18.83	33.03	90	11.25	34.09		
30	18.33	33.18					

St. No.	Date	Date	Depth	Water Color.	Water Trans.	Wave	Swell
04	15	05:40	95			NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2		16.5				
		1013.5					C
Z m	T C	S ‰	Z m	T C	S ‰		
0	19.39	32.69	50	14.05	34.07		
10	19.10	32.68	75	14.00	34.07		
20	18.60	32.94	90	14.00	34.08		
30	17.51	33.48					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	15	07:00	135			NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1013.5	16.5		Ns	10	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	22.70	33.26	50	17.70	33.57		
10	22.70	33.21	75	15.75	33.89		
20	21.30	32.91	100	15.05	34.29		
30	20.57	32.71	125	15.05	34.31		

12월 (December)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	25	06:23	47			E 2	E 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	4	1025.5	16.0		Gi	3	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	12.49	33.95	30	12.33	33.80		
10	12.54	33.84	45	12.03	33.78		
20	12.47	33.83					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	25	07:55	64	6	12	NE 2	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	5	1025.7	5.6		Ac	4	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	16.10	34.14	30	16.03	34.15		
10	16.32	34.16	50	15.60	34.16		
20	16.30	34.16	60	14.90	34.04		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell	
03	25	09:07	82	5	13	NE 2	NE 2	
Wind		Baro.	Air Temp.		Cloud		Weather	
Direction	Force		Dry	Wet	Type	Amount		
NE	5	1025.8	7.1		Ac	4	BC	
Z m	T C		S ‰		Z m	T C		S ‰
0	16.90		34.12		30	16.74		34.06
10	16.49		34.08		50	15.71		34.17
20	16.09		34.08		75	14.33		34.14

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell	
04	25	10:23	92	4	14	NE 2	NE 2	
Wind		Baro.	Air Temp.		Cloud		Weather	
Direction	Force		Dry	Wet	Type	Amount		
NE	5	1025.3	7.2		Ns	10	C	
Z m	T C		S ‰		Z m	T C		S ‰
0	16.10		34.09		50	15.95		34.02
10	15.65		34.02		75	15.75		34.01
20	15.88		34.02		90	13.40		33.90
30	15.90		34.00					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell	
05	25	11:57	105	4	16	NE 2	NE 2	
Wind		Baro.	Air Temp.		Cloud		Weather	
Direction	Force		Dry	Wet	Type	Amount		
NE	5	1025.5	7.5		Ns	10	C	
Z m	T C		S ‰		Z m	T C		S ‰
0	16.60		34.21		50	17.30		34.21
10	16.83		34.21		75	13.91		33.94
20	17.27		34.20		100	13.60		34.06
30	17.37		34.20					

205 선 해 양 관 측 성 적

OCEANOGRAPHIC DATA, LINE 205

2월 (February)

조사선 태백산 (Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	12	19:30	60			NE 2	NE 3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	4	1019.0	8.5				C

Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	%	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	%	μg-at/L	μg-at/L	μg-at/L
1	13.30	34.26	5.93	0.59	0.95	2.16	30	12.45	34.14	5.83	0.34	0.41	6.75
10	13.08	34.23	6.03	0.54	0.97	2.97	50	12.70	34.12	-	0.32	0.24	4.05
20	12.33	34.18	-	0.54	1.11	2.97							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	12	07:10	60	4	12	E 3	E 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	3	1020.0	8.5		Cc	3	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
	14.60	34.31	30	14.20	34.30		
10	14.75	34.30	50	13.77	34.28		
20	14.65	34.32					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell					
03	12	16:12	78	4	12	E 3	E 2					
Wind		Baro.	Air Temp		Cloud		Weather					
Direction	Force		Dry	Wet	Type	Amount						
E	3	1020.8	8.6		Cc	3	BC					
T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
°C	‰	%	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	%	μg-at/L	μg-at/L	μg-at/L
14.80	34.27	-	0.16	0.58	5.78	30	14.65	34.30	5.63	0.45	1.27	0
14.79	34.34	5.95	0.36	1.19	4.32	50	14.25	34.31	5.73	0.54	0.97	1.35
14.87	34.30	5.63	0.47	0.84	1.35	75	13.88	34.26	7.14	0.61	0.08	0

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	12	15:15	90	4	13	E 3	E 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	3	1025.2	8.9		Cc	3	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	14.81	34.17	50	14.33	34.26		
10	14.84	34.32	75	12.06	34.02		
20	14.85	34.31	85	11.71	33.99		
30	14.70	34.30					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell				
05	12	13:50	110	4	13	E 3	E 2				
Wind		Baro.	Air Temp.		Cloud		Weather				
Direction	Force		Dry	Wet	Type	Amount					
E	3	1025.2	10.3		A c	3	BC				
Z m	T C	S ‰	C ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L
0	15.30	34.21	5.53	0.13	2.16	50	15.00	34.31	5.63	0.18	9.99
10	15.30	34.31	5.53	0.14	5.13	75	14.31	34.30	5.43	0.20	3.78
20	15.22	34.31	5.53	0.31	3.78	100	12.80	34.30	5.93	0.25	4.32
30	15.16	34.30	5.78	0.09	3.51						

4 월 (April)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	13	02:30	54			NE 2	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	1	1024.5	11.2			1	B
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	13.65	34.59	30	13.68	34.56		
10	13.90	34.57	50	12.85	34.56		
20	13.82	34.56					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	13	01:15	62			NE 2	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	1	1024.5	11.4			1	B
Z m	T C	S ‰		Z m	T C	S ‰	
0	14.50	34.60		30	14.40	34.58	
10	14.42	34.59		50	14.02	34.57	
20	14.43	34.59		60	13.25	34.54	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	12	23:50	80			NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1024.5	10.2				
Z m	T C	S ‰		Z m	T C	S ‰	
0	14.00	34.62		30	14.15	34.57	
10	14.17	34.59		50	13.50	34.55	
20	14.18	34.59		75	12.22	34.53	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	12	21:50	88			NE 2	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1024.5	14.0				
Z m	T C	S ‰		Z m	T C	S ‰	
0	14.45	34.59		50	13.70	34.58	
10	14.40	34.59		75	13.32	34.56	
20	14.43	34.60		85	12.71	34.54	
30	14.03	34.59					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	12	19:50	108			NE 2	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1024.5	18.2				B
Z m	T C	S ‰	Z m	T C	S ‰		
0	15.30	34.25	50	14.00	34.54		
10	15.25	34.56	75	13.68	34.54		
20	14.88	34.55	100	12.22	34.47		
30	14.30	34.54					

6월 (June)

조사선 태백산 (Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	11	05:45	54			SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1005.5	19.2				
Z m	T C	S ‰	Z m	T C	S ‰		
0	19.35	33.64	30	17.23	34.26		
10	19.02	33.76	50	15.40	34.32		
20	18.05	34.12					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	11	08:00	60			SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1005.2	19.2				F
Z m	T C	S ‰	Z m	T C	S ‰		
0	18.86	33.95	30	16.60	34.25		
10	18.57	34.00	50	14.05	34.44		
20	17.26	34.27					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	11	09:00	85	2	9	S 1	S 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	1	1004.5	20.5				F
Z m	T C	S ‰	Z m	T C	S ‰		
0	19.00	34.08	30	15.49	34.27		
10	18.71	34.24	50	14.11	34.32		
20	19.56	34.27	80	13.85	34.43		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	11	10:30	85	2	9	S 1	S 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1004.0	21.0				F
Z m	T C	S ‰	Z m	T C	S ‰		
0	19.34	34.27	30	18.44	34.35		
10	19.14	34.27	50	17.33	34.41		
20	18.66	34.36	80	16.95	34.43		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	11	11:50	110	2	16	SE 1	SE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S E	3	1004.5	21.5		Ns	10	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	19.83	33.72	50	18.65	34.35		
10	19.84	33.71	75	16.84	34.50		
20	19.70	33.83	100	14.91	34.59		
30	19.59	34.00					

8월 (August)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	16	10:30	45	5	8	NE 1	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1012.4	28.0		Cu	1	B
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	P H
0	26.12	32.50	5.13	0.25	0.11	10.80	8.40
10	22.55	32.99	5.50	0.41	0.30	9.72	8.36
20	20.22	33.20	5.18	0.32	0.89	12.42	8.41
30	17.36	33.63	4.35	.72	0.62	9.99	8.41
43	15.36	34.05	4.15	0.76	0.41	11.07	8.37

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	16	11:50	55	5	8	NE 1	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1012.5	27.8		Cu	2	B
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	24.08	32.90	30	17.85	33.71		
10	21.00	33.09	50	15.39	34.06		
20	20.38	33.34					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	16	13:20	80	5	10	SE 1	SE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1012.5	28.0		Ci	2	B
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	P H
0	25.98	32.59	5.02	0.14	0.30	10.26	8.31
10	21.77	33.08	5.40	0.23	0.11	15.74	8.41
20	20.69	33.23	5.49	0.36	0.19	15.12	8.45
30	19.11	33.46	4.84	0.45	0.68	11.88	8.47
50	15.49	34.05	4.64	-	-	-	-
75	14.79	34.30	4.17	0.72	0.22	8.10	8.38

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	16	15:20	80	4	18	E 2	SE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1012.5	28.4		Cc	2	B
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	27.23	32.17	30	22.09	32.87		
10	26.48	32.09	50	16.62	32.81		
20	25.85	32.25	75	15.22	34.32		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	16	17:20	150	4	21	SE 2	SE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1012.5	28.4		Cc	1	B
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	pH
m	C	‰	%	μg-at/L	μg-at/L	μg-at/L	
0	27.11	32.67	4.60	0.20	0.38	5.40	8.45
10	26.03	32.69	4.82	0.27	0.16	10.26	8.50
20	24.85	-	4.73	0.25	0.22	12.15	8.52
30	22.91	33.18	5.02	0.14	0.22	9.18	8.46
50	19.85	33.42	4.66	0.32	0.51	17.28	8.49
75	18.00	33.91	4.26	0.63	1.65	16.74	8.47
100	16.20	34.01	4.27	0.81	0.38	9.99	8.42
125	16.00	34.07	4.27	0.63	0.24	13.50	8.34
145	14.90	34.37	3.97	0.85	0.11	12.96	8.30

10월 (October)

조사선 태백산 (Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	14	08:20	54	6	8	NW 1	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1019.0	20.2				B
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	18.60	32.86	30	15.60	34.01		
10	17.75	33.21	50	15.51	34.03		
20	15.85	33.95					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	14	10:40	57	5	13	NW 1	
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1019.0	20.3				B
Z m	T C		S ‰	Z m	T C		S ‰
0	19.23		32.97	30	15.96		33.86
10	18.22		32.13	50	14.42		34.68
20	17.50		33.35				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	14	11:50	87	4	14	N 1	
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	1	1018.5	20.9				B
Z m	T C		S ‰	Z m	T C		S ‰
0	24.04		33.67	50	15.35		33.88
10	20.38		32.64	75	14.24		34.12
20	20.25		32.83	85	14.20		34.14
30	15.30		33.24				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	14	13:45	85	4	15	N 1	
Wind		Baro.	Air Temp		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	1	1018.5	21.0				B
Z m	T C		S ‰	Z m	T C		S ‰
0	24.20		33.50	30	22.07		33.56
10	23.59		33.45	50	17.03		34.11
20	23.40		33.46	75	14.75		34.07

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	14	15:00	100	4	16	N 1	
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	1	1018.5	21.5				B
Z m	T C	S ‰	Z m	T C	S ‰		
0	23.95	33.31	50	21.10	34.02		
10	23.73	33.24	75	18.65	34.49		
20	23.73	33.33	95	17.73	34.54		
30	23.80	33.39					

12월 (December)

조사선 한라산 (Hon Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	21	13:20	54	5	5	NW 2	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1031.4					
Z m	T C	S ‰	Z m	T C	S ‰		
0	12.45	33.67	30	12.48	33.70		
10	12.48	33.70	50	12.40	33.81		
20	12.48	33.69					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	21	14:28	60	5	7	NW 2	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1031.4	9.5		Cl	4	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	13.13	33.75	30	11.98	33.54		
10	13.14	33.75	50	11.91	33.53		
20	12.46	33.64	58	11.93	33.83		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	21	15:45	80	4	15	NW 2	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1031.0	8.9		Ci	5	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	15.22	33.84	30	16.31	33.91		
10	15.31	33.85	50	13.15	33.79		
20	15.31	33.71	75	13.01	33.93		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	21	18:45	85			NW 2	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1036.5	8.4		Ci	2	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	15.81	33.93	30	14.72	33.99		
10	15.28	33.79	50	14.21	33.92		
20	15.19	32.99	75	15.45	33.99		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	21	20:35	108			NW 2	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1030.5	8.3		Ci	2	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	17.93	34.16	50	16.92	33.99		
10	18.05	34.33	75	15.97	34.08		
20	17.96	34.14	100	15.93	-		
30	17.05	33.21	105	15.98	-		

204 선 해 양 관 측 결 과

OCEANOGRAPHIC DATA LINE 204

2월 (February)

조차선

태백산 (Tae Saek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	12	20:15	40			NE 2	NE 3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	4	1019.0	8.2				C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	13.10	34.20	20	13.02	34.24		
10	13.02	34.25	30	12.75	34.22		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
02	12	21:30	30			NE 2	NE 3						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NE	3	1019.0	8.0				C						
Z	T	S	O ₂	PC ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PC ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L
0	12.73	34.22	6.24	0.54	0.19	2.43	20	12.63	34.20	-	0.38	0.66	3.51
10	12.73	34.21	5.76	0.61	0.68	3.24							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	12	23:00	45			NE 2	NE 3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1019.0	8.5				C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	12.85	34.20	20	12.70	34.20		
10	12.78	34.22	30	12.70	34.20		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
04	13	00:55	82			SW 2	SW 1						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
SW	2	1017.7	8.2				R						
Z m	T C	S ‰	O ₂ ‰	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ ‰	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	13.73	34.27	6.05	0.45	0.27	0	30	13.30	34.23	5.85	0.72	0.30	0.27
10	13.66	34.26	5.85	0.40	0	0	50	13.20	34.24	5.84	0.36	0	0.54
20	13.42	34.23	8.95	-	-	-	75	12.99	34.22	5.85	0.56	0.03	0.27

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	13	02:15	90			SW 2	SW 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1017.7	8.0				R
Z m	T C		S ‰	Z m	T C		S ‰
0	15.38		34.27	50	15.38		34.27
10	15.89		34.28	75	15.30		34.28
20	15.38		34.25	85	14.92		34.27
30	15.39		34.28				

St.No		Date		Time		Depth		Water Color.		Water Trans.		Wave		Swell	
06		13		03:45		110						NW 2		NW 2	
Wind				Baro.		Air Temp.				Cloud				Weather	
Direction		Force				Dry		Wet		Type		Amount			
NW		3		1017.9		8.0								R	
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si		
m	C	‰	‰	μg-at/L	μg-at/L	μg-at/L	m	C	‰	‰	μg-at/L	μg-at/L	μg-at/L		
0	15.41	34.27	5.49	0.43	0.65	0.27	50	15.49	34.29	6.33	0.52	0.03	2.97		
10	15.39	34.26	5.63	0.43	0.14	1.35	75	15.30	34.29	5.53	0.43	0.14	8.64		
20	15.43	34.24	5.64	0.43	0.41	0.27	100	15.40	34.27	5.44	0.54	0.81	3.51		
30	15.23	34.31	5.34	0.49	0	3.78									

4 월 (April)

조사선 지리산 (Chi Ri San)

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	13	03:33	38			NE 2	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1024.0	12.4			1	B
Z m	T °C		S ‰	Z m		T °C	S ‰
0	12.25		34.39	20		12.26	34.40
10	12.40		-	30		12.15	34.30

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	13	05:00	35			NE 2	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1024.5	12.2			1	B
Z m	T °C		S ‰	Z m		T °C	S ‰
0	12.94		34.13	20		11.66	34.17
10	12.93		34.12	30		11.67	34.19

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	13	06:30	52			SE 2	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1025.0	12.1			1	B
Z m	T °C		S ‰	Z m		T °C	S ‰
0	13.51		34.51	30		13.56	34.51
10	13.72		34.55	50		13.35	34.51
20	13.72		34.50				

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	13	08:40	84			SE 2	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1025.5	12.2			1	B
Z m	T C		S ‰	Z m	T C		S ‰
0	14.84		34.61	30	13.32		34.54
10	14.60		34.60	50	13.20		34.53
20	13.59		34.55	75	13.20		34.53

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	13	10:10	83			SE 2	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1025.0	12.0			1	B
Z m	T C		S ‰	Z m	T C		S ‰
0	14.84		34.59	30	14.15		34.59
10	14.19		34.58	50	14.10		34.58
20	14.11		34.58	75	13.57		34.57

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	13	11:50	104			NE 2	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1025.5	12.0			1	B
Z m	T C		S ‰	Z m	T C		S ‰
0	13.80		34.57	50	13.92		34.56
10	13.89		34.57	75	13.84		34.56
20	13.95		34.57	100	13.44		34.54
30	13.85		34.57				

6월 (June)

조사선 태백산 (Tae Baek San)

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	11	05:15	38			SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1005.2	19.2				
Z m	T C	S ‰	Z m	T C	S ‰		
0	17.29	33.62	30	17.15	34.19		
10	19.18	33.59	35	16.38	34.22		
20	18.26	33.86					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	11	04:05	28			SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1005.4	19.0				
Z m	T C	S ‰	Z m	T C	S ‰		
0	18.93	33.77	20	17.06	34.10		
10	18.37	33.81	25	16.62	34.15		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	11	03:00	47			SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1007.0	20.0				
Z m	T C	S ‰	Z m	T C	S ‰		
0	19.25	34.24	30	16.01	34.28		
10	18.81	-	45	15.30	34.36		
20	17.04	34.24					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	9	01:10	76			SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1007.0	19.8				
Z	T		S	Z		T	S
m	C		‰	m		C	‰
0	18.78		34.26	30		18.17	34.24
10	17.37		34.25	50		15.05	34.50
20	16.81		-	75		15.02	34.51

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	10	23:50	90			SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1007.0	20.0				
Z	T		S	Z		T	S
m	C		‰	m		C	‰
0	20.15		34.10	50		17.40	34.42
10	20.08		34.08	75		15.40	34.55
20	18.80		34.26	85		14.50	34.55
30	18.35		34.36				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	10	22:30	128			SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1007.0	21.0				
Z	T		S	Z		T	S
m	C		‰	m		C	‰
0	19.78		34.19	50		16.35	34.48
10	19.41		34.17	75		16.01	34.52
20	18.55		34.26	100		-	-
30	18.45		34.33	125		14.54	34.55

8월 (August)

조사선 지리산 (Chi Ri San)

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	16	09:30	35	5	?	NE 1	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1012.3	27.4		Cu	1	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	25.68	32.68	20	20.35	33.23		
10	22.49	33.07	30	16.70	33.76		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	16	08:00	35	5	7	NE 1	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1012.3	26.8		Gi	2	B
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	pH
0	25.25	32.82	4.92	0.18	0.19	9.99	8.40
10	22.87	32.95	5.21	0.63	0.95	11.61	8.49
20	20.91	33.29	5.63	0.36	0.19	5.40	8.49
30	18.46	33.67	4.74	0.27	0.08	9.99	6.32

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	15	11:40	53	5	8	NE 1	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1012.0	26.0		Cu	2	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	25.45	32.51	30	19.05	33.55		
10	22.28	33.07	50	17.37	33.83		
20	20.15	33.36					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	15	09:25	80			SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1012.5	26.0		Cu	1	B
Z m	T C	S ‰	O ₂ %	PO ₄ -P µg-at/L	NO ₂ -N µg-at/L	SiO ₂ -Si µg-at/L	pH
0	25.93	32.39	4.82	0	0.43	6.48	8.35
10	24.86	32.39	5.01	0.07	0.16	8.91	8.29
20	22.50	33.07	5.11	0.02	0.51	7.83	8.34
30	21.44	33.23	4.80	0.13	1.03	7.56	8.31
50	15.77	34.20	4.45	0.36	0.38	9.72	8.32
75	14.69	34.47	4.37	0.40	0.43	15.39	8.35

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	15	07:45	90			SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1012.5	26.5				B
Z m	T C	S ‰	Z m	T C	S ‰		
0	25.27	32.88	50	19.29	34.00		
10	24.95	32.75	75	14.76	34.58		
20	24.26	32.92	88	14.72	34.62		
30	21.60	33.44					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	15	06:10	120			SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1012.5	26.5				B
Z m	T C	S ‰	O ₂ %	PO ₄ -P µg-at/L	NO ₂ -N µg-at/L	SiO ₂ -Si µg-at/L	pH
0	26.80	32.58	4.92	0	0.81	9.45	8.47
10	26.60	33.44	4.84	-	-	-	-
20	24.88	33.60	5.11	0.05	1.46	10.53	8.42
30	22.08	33.22	5.02	0.02	0.14	7.56	8.42
50	20.09	33.64	4.64	0.14	0.49	11.88	8.38
75	15.10	34.41	4.46	0.23	0.16	12.15	8.29
100	14.91	34.56	4.37	0.34	0.11	6.75	8.35
118	14.56	34.57	4.44	0.34	0.38	11.88	8.32

10 월 (October)

조사선

태백산 (Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	14	07:40	35	6	13	NW 1	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1019.0	20.2				B
Z m	T C		S ‰	Z m	T C		S ‰
0	18.60		32.93	20	18.50		33.11
10	18.50		33.05	30	16.44		33.35

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	14	05:50	25			NW 1	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1018.5	20.2				BC
Z m	T C		S ‰	Z m	T C		S ‰
0	17.93		33.39	20	16.25		33.75
10	17.85		33.28				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	14	04:30	50			NW 1	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1018.7	19.5				BC
Z m	T C		S ‰	Z m	T C		S ‰
0	19.00		32.61	30	17.30		34.00
10	18.20		32.73	45	14.95		34.00
20	18.85		33.25				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	14	02:30	80			NW 1	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1018.7	19.0				BC
Z m	T C		S ‰	Z m	T C		S ‰
0	16.45		32.57	30	14.20		34.18
10	17.15		33.36	50	14.23		34.19
20	14.37		34.10	75	14.21		34.17

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	14	01:10	90			NW 1	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1018.7	19.5				BC
Z m	T C		S ‰	Z m	T C		S ‰
0	19.89		32.20	30	15.80		33.32
10	19.03		32.53	50	15.18		33.88
20	18.38		32.79	75	14.80		34.45

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	13	24:00	115			NW 1	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1018.7	19.6				BC
Z m	T C		S ‰	Z m	T C		S ‰
0	23.00		33.24	50	17.98		33.12
10	22.98		33.21	75	16.05		33.59
20	21.95		33.09	100	15.17		34.01
30	18.14		32.86	113	14.65		34.38

12월 (December)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	9	09:20	32	5	2	NW 2	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1024.3	13.8		Cs	2	B
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	13.68	33.14	20	13.63	33.58		
10	13.54	33.59	30	13.63	33.59		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	9	10:45	32	5	5.5	NW 2	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1024.7	15.3		Cs	7	BC
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	14.92	33.94	20	14.83	33.95		
10	14.92	33.97	30	14.82	33.95		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	9	12:17	58	5	6.5	NW 2	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1023.8	15.0		Cs	9	C
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	14.22	33.77	30	14.82	33.76		
10	14.78	33.75	50	14.83	33.86		
20	14.79	33.75					

St. No.	Date	Time	Depth	Water Color .	Water Trans .	Wave	Swell
04	9	14:32	80	4	3	NW 2	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1022.5	14.2		Cs	10	C
Z m	T C		S ‰	Z m	T C		S ‰
0	14.77		33.55	30	14.71		33.62
10	14.61		33.55	50	15.86		34.22
20	14.62		33.56	75	15.89		34.49

St. No.	Date	Time	Depth	Water Color .	Water Trans.	Wave	Swell
05	9	16:05	81	4	12	SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1022.0	14.0		Cs	10	C
Z m	T C		S ‰	Z m	T C		S ‰
0	16.58		-	30	14.34		33.56
10	16.13		33.61	50	14.34		33.60
20	14.53		33.55	75	14.34		34.26

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	11	07:35	98			NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	5	1021.6	14.1		Cs	10	C
Z m	T C		S ‰	Z m	T C		S ‰
0	18.40		33.92	50	17.45		33.83
10	18.40		33.88	75	17.07		-
20	18.25		33.92	95	16.02		34.51
30	17.96		33.85				

203선 해양관측성적

OCEANOGRAPHIC DATA, LINE 203

2월 (February)

조사선

태백산 (Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
01	22	1415	56	5	8	NW 2	NW 2						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW	3	1018.0	5.9		Ns	10	C						
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	13.33	34.28	5.83	0.31	0	1.62	30	13.17	34.27	5.88	0.43	0	5.40
10	13.36	34.28	5.80	0.49	0	3.24	50	11.42	34.26	5.83	0.50	0.62	2.97
20	13.28	34.28	5.92	0.56	0	5.13							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	22	12:30	100	5	8	NW 2	NW 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1018.0	5.7		Ns	10	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	13.80	34.31	50	13.52	34.27		
10	13.85	34.31	75	13.41	34.28		
20	13.58	34.29	95	13.32	34.27		
30	13.53	34.22					

St. No.		Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell					
03		22	11:10	105	5	8	NW 2	NW 3					
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW		3	1018.0	5.5		Ns	10	C					
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	14.10	33.51	5.60	0.27	0	4.32	50	14.12	34.32	8.24	0.43	0.05	2.70
10	14.17	34.28	5.73	0.04	0	3.51	75	14.14	34.36	5.68	0.43	0.05	4.05
20	14.21	34.29	5.88	0.27	0	3.24	100	14.13	34.33	5.72	0.45	0	2.70
30	14.20	34.32	5.73	0.27	0	3.24							

4월 (April)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Tans.	Wave	Swell
01	17	15:10	54			SE 2	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1008.5	15.0		As	10	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	13.80	34.53	30	13.41	34.53		
10	13.57	34.53	50	13.36	34.52		
20	13.50	34.53					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	17	13:40	97			SW 2	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1008.5	15.8		As	10	R
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	14.00	34.52	50	12.74	34.48		
10	13.81	34.52	75	12.74	34.47		
20	13.09	34.49	95	12.75	34.47		
30	12.66	34.48					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	17	12:00	120			SW 2	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1008.0	16.2		As	8	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	14.00	34.51	50	13.31	34.49		
10	13.70	34.49	75	13.60	34.49		
20	13.43	34.49	100	13.11	34.48		
30	13.42	34.50	117	12.94	34.47		

6월 (June)

조사선 태백산 (Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	6	12:45	57	3	10	NE 2	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	3	1006.0	19.2		Cs	10	C
Z m	T C		S ‰	Z m		T C	S ‰
0	17.94		34.19	30		15.28	34.30
10	16.20		34.22	50		13.30	34.37
20	15.43		34.29				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	6	13:55	95	3	11	NE 2	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	4	1005.0	20.2		Cs	10	C
Z m	T C		S ‰	Z m		T C	S ‰
0	17.80		34.29	50		14.31	34.23
10	17.75		34.23	75		13.70	-
20	17.50		34.20	90		13.42	34.45
30	16.25		34.25				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	6	15:20	135	4	14	NE 2	NE 3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	4	1004.0	21.2		Cs	10	C
Z m	T C		S ‰	Z m		T C	S ‰
0	18.43		34.43	50		17.23	34.40
10	18.31		34.44	75		15.00	34.49
20	18.29		34.42	100		14.88	34.50
30	18.17		34.43	130		14.24	34.26

8월 (August)

조사선

지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	13	02:00	60			NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3		24.3				
		1010.5					B
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	23.51	32.41	30	20.45	33.57		
10	23.31	32.62	50	16.48	33.95		
20	22.98	32.89					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	13	03:30	80			NE 2	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3		23.7				
		1010.5					B
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	P H
0	25.61	32.11	4.83	0.25	0.24	8.37	8.12
10	25.65	32.14	4.83	0.09	-	6.48	8.13
20	24.61	33.10	5.58	0.27	0.22	6.48	8.21
30	23.65	33.91	4.63	0.32	-	14.85	9.27
50	17.79	34.35	4.54	0.27	-	-	8.35
75	15.01	34.38	4.64	-	-	-	-

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	13	05:45	110			NE 2	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3		24.4				
		1010.5					BC
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	25.02	32.16	50	21.28	32.77		
10	25.51	-	75	20.35	33.84		
20	24.41	32.22	100	18.94	34.14		
30	23.65	33.24	103	18.00	34.30		

10 월 (October)

조작선 태백산 (Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	10	04:45	55			W 1	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	1	1012.5	21.7				F
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	18.50	33.39	30	17.07	33.53		
10	18.07	33.32	50	14.60	34.11		
20	17.15	33.50					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	10	06:10	105			W 1	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	1	1012.2	23.0				F
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	21.30	31.97	50	16.50	33.69		
10	21.05	31.78	75	14.45	34.12		
20	20.62	32.26	100	14.29	34.18		
30	20.98	32.26					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	10	07:35	110			W 1	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	1	1012.2	23.5		Ns	10	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	21.25	31.59	50	14.90	33.65		
10	21.11	31.69	75	14.24	34.21		
20	20.36	32.12	100	14.23	34.24		
30	19.18	32.69					

12월 (December)

조사선 한라산 (Han Ra San.)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	17	08:38	54	6	9	SW2	SW1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1029.1	7.0		C1	2	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	16.40	33.73	30	16.54	33.74		
10	16.52	33.74	50	16.59	33.84		
20	16.50	33.72					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	17	07:05	93			E 2	E 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1029.0	5.8		Ac	2	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	16.90	33.80	50	16.31	33.67		
10	16.52	33.78	75	14.82	33.44		
20	16.71	33.77	90	14.80	33.53		
30	16.80	33.76					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	17	05:33	110			E 2	E 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1029.2	4.2		Ac	3	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	14.70	33.52	50	14.76	33.47		
10	14.85	33.46	75	14.81	33.51		
20	14.86	33.45	100	14.95	33.60		
30	14.86	33.47					

313 선 해 양 관 측 성 적
OCEANOGRAPHIC DATA, LINE 313

2월 (February)

조사선 태백산 (Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
02	22	09:40	110	5	8	NW 2	NW 3						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW	3	1018.2	5.2		Ns	10	C						
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	14.59	34.29	5.73	0.14	0	2.16	50	14.61	34.29	5.54	0.34	0.03	2.97
10	14.53	34.30	5.67	0.14	0	3.51	75	14.59	34.28	5.63	0.25	0	5.67
20	14.58	34.29	5.61	0.36	0	1.89	100	14.59	34.29	5.63	0.23	0	2.43
30	14.73	34.28	5.57	0.23	0.03	4.32							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	22	06:50	97			NW 1	NW 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1018.5	4.7				C

Z	T	S	Z	T	S
m	C	‰	m	C	‰
0	14.00	34.30	50	14.29	34.31
10	14.31	34.31	75	14.19	34.31
20	14.19	34.31	90	14.20	34.27
30	14.21	34.31			

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	22	05:40	88			NW 1	NW 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1019.0	4.5				C

Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiC ₂ -Si	Z	T	S	C ₂	PO ₄ -P	NO ₂ -N	SiC ₂ -Si
m	C	‰	%	μg-at/L	μg-at/L	μg-at/L	m	C	‰	%	μg-at/L	μg-at/L	μg-at/L
0	14.32	34.28	5.63	0.14	0	4.05	30	14.33	34.29	5.41	0.36	0	4.05
10	14.29	34.30	5.62	0.14	0	3.78	50	14.35	34.28	5.41	0.36	0	2.97
20	14.30	34.31	5.43	0.34	0	2.16	75	14.31	34.28	5.53	0.38	0	4.32

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	22	04:20	88			NW 1	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1019.3	4.7				C
Z m	T C	S ‰	Z m	T C	S ‰		
0	14.16	34.31	30	14.19	34.28		
10	14.25	34.27	50	14.21	34.27		
20	14.21	34.28	75	14.19	34.28		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
06	22	03:15	83			NW1	NW1						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW	1	1019.5	5.0				C						
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	C ₂ %	PC ₄ -P μg-at/L	NC ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	13.96	34.25	5.92	0.14	0	3.24	30	13.98	34.26	5.61	0.14	0	-
10	13.99	34.26	5.72	0.23	0	2.70	50	13.93	34.25	5.61	0.20	0	2.97
20	14.02	34.26	5.63	0.14	0	3.78	75	13.99	34.28	5.57	0.14	0	3.51

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	22	01:55	75			NW 1	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1019.5	5.1				C
Z m	T C	S ‰	Z m	T C	S ‰		
0	13.90	34.23	30	14.00	34.24		
10	13.97	34.23	50	13.91	34.25		
20	13.99	34.22	70	13.90	34.23		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	22	00:40	76			NW 1	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1020.0	5.3				C

Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L
0	13.70	34.25	5.63	0.29	0	1.89	30	13.75	34.23	5.63	0.11	0	4.05
10	13.71	34.24	5.60	0.38	0	2.70	50	13.80	34.24	5.63	0.09	0	5.40
20	13.82	34.23	5.58	0.23	0	4.59	75	13.76	34.23	5.74	0.25	0	1.89

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	21	23:20	76			NW 1	NW 1
Wind		Baro.	Air Temp.		Cloud		
Direction :	Force		Dry	Wet	Type	Amount	
NW	1	1021.5	5.5				C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	13.90	34.21	30	13.73	34.22		
10	13.74	34.23	50	13.70	34.23		
20	13.70	34.25	75	13.67	34.22		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
10	21	22:15	74			NW 2	NW 2						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW	2	1020.5	5.5				C						
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L
0	13.43	-	6.50	0.22	0	3.78	30	13.50	34.20	5.58	0.29	0	1.35
10	13.47	33.90	5.73	0.18	0	2.97	50	13.45	34.18	5.63	0.38	0	2.16
20	13.48	34.19	5.69	0.14	0.14	2.16	70	13.61	34.18	5.70	0.20	0	4.32

4월 (April)

조사선 지리산 (Chi Ri San.)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	17	09:10	91			SW 2	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1008.0	15.0		As	6	BC
Z m	T C	S ‰		Z m	T C	S ‰	
0	14.98	34.57		50	14.46	34.57	
10	14.93	34.57		75	14.40	34.57	
20	14.84	34.57		90	14.30	34.56	
30	14.53	34.57					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	17	07:30	92			SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1009.0	15.2		As	6	BC
Z m	T C	S ‰		Z m	T C	S ‰	
0	14.74	34.56		50	14.12	34.57	
10	14.85	34.56		75	14.20	34.57	
20	14.34	34.56		90	14.13	34.57	
30	14.18	34.54					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	17	06:00	100			SE 1	SE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1010.0	16.0		As	6	BC
Z m	T C	S ‰		Z m	T C	S ‰	
0	14.78	34.55		50	14.10	34.55	
10	14.60	34.55		75	14.08	34.55	
20	14.42	34.55		98	14.02	34.54	
30	14.16	34.54					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	17	04:20	92			SE 3	SE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1010.0	15.0				
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	14.88	34.28	50	14.43	34.57		
10	14.86	34.54	75	14.31	34.56		
20	14.42	34.56	90	14.27	34.57		
30	14.79	34.57					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	17	03:50	92			SE 3	SE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1010.0	14.6				
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	14.00	34.57	50	14.28	34.56		
10	15.26	34.57	75	14.25	34.56		
20	15.12	34.56	90	14.07	34.55		
30	14.48	34.56					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	17	02:10	80			SE 3	SE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1010.0	14.5				
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	14.03	34.54	30	13.82	34.56		
10	13.92	34.54	50	13.63	34.57		
20	13.84	34.54	75	13.61	34.54		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	17	00:45	80			SE 3	SE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1010.0	14.5				C
Z m	T C		S ‰	Z m	T C		S ‰
0	15.06		34.54	30	13.64		34.54
10	14.05		34.53	50	13.48		34.54
20	14.03		34.52	75	13.40		34.53

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	16	23:10	72	4		SE 3	SE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1010.0	14.5		As	10	C
Z m	T C		S ‰	Z m	T C		S ‰
0	14.06		34.55	30	13.70		34.53
10	13.90		34.54	50	13.44		34.53
20	13.81		34.53	70	13.30		34.53

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	16	21:40	78			SE 2	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1010.5	16.2		As	8	C
Z m	T C		S ‰	Z m	T C		S ‰
0	14.00		34.55	30	13.87		34.54
10	14.42		34.55	50	13.80		34.53
20	13.99		34.54	75	13.71		34.53

6 월 (June)

조사선 태백산 (Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	6	18:00	92	3	10	E 1	E 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	4	1005.0	20.8				6
Z m	T C		S ‰	Z m	T C		S ‰
0	18.85		34.37	30	16.50		34.48
10	18.73		34.37	50	16.25		34.50
20	17.70		34.44	75	15.90		34.50

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	6	19:15	92			E 1	E 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1005.0	19.5				6
Z m	T C		S ‰	Z m	T C		S ‰
0	19.30		34.37	50	16.82		34.49
10	19.05		34.36	75	16.10		34.51
20	19.01		34.36	90	15.49		34.51
30	18.25		34.42				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	6	20:30	92			NE 1	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1002.0	19.0				
Z m	T C		S ‰	Z m	T C		S ‰
0	19.15		34.40	50	16.89		34.49
10	18.90		34.44	75	15.48		34.53
20	18.14		34.44	90	15.50		34.52
30	18.00		34.44				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	6	21:40	75			NE 1	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1002.0	18.5				
Z m	T C		S ‰	Z m	T C		S ‰
0	18.55		34.42	30	18.05		34.42
10	18.51		34.40	50	16.80		34.52
20	18.47		34.44	70	14.94		34.51

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	6	22:50	83			E 1	E 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	3	1000.0	18.0				
Z m	T C		S ‰	Z m	T C		S ‰
0	18.57		34.41	30	18.01		34.43
10	18.52		34.42	50	16.47		34.50
20	18.21		34.45	75	15.20		34.51

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	6	23:50	80			E 2	E 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	3	999.0	17.5				
Z m	T C		S ‰	Z m	T C		S ‰
0	18.55		34.43	30	18.07		34.36
10	18.51		34.37	50	15.71		34.49
20	18.34		34.42	75	15.25		34.51

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	7	00:10	80			E 1	E 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	3	998.0	17.0				
Z	T		S	Z	T		S
m	C		‰	m	C		‰
0	18.55		34.33	30	18.10		34.34
10	18.53		34.36	50	15.95		34.56
20	18.43		34.37	75	15.29		34.53

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	7	02:25	80			E 2	E 3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	4	999.4	17.2				R
Z	T		S	Z	T		S
m	C		‰	m	C		‰
0	18.45		34.27	30	17.93		34.29
10	18.50		34.31	50	15.54		34.36
20	18.45		34.25	75	14.08		34.32

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	7	03:20	68			N 1	N 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	5	995.0	19.0				R
Z	T		S	Z	T		S
m	C		‰	m	C		‰
0	17.29		34.30	30	15.84		-
10	17.30		-	50	14.51		34.36
20	17.03		-	65	13.68		34.29

8월 (August)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	13	06:30	90	5	13	NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1011.2	24.3		As	8	C
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	pH
0	24.30	35.29	4.92	0.38	-	5.40	8.46
10	23.90	32.86	5.13	0.23	0.24	13.50	8.51
20	21.90	33.28	4.83	0.27	0.57	7.83	8.50
30	19.91	33.48	4.75	0.25	0.68	8.10	8.45
50	19.40	33.57	4.46	0.31	0.46	12.96	8.45
75	18.38	33.45	4.66	0.36	0.76	9.99	8.45
88	18.39	33.89	4.62	0.22	0.49	13.50	8.36

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	13	09:50	92	5	14	NE 1	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	4	1011.3	24.5		As	8	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	24.30	32.37	50	18.32	33.83		
10	24.53	32.75	75	16.58	34.01		
20	21.76	33.13	90	16.68	34.05		
30	20.15	33.48					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	13	11:05	88	3	19	NE 1	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	4	1011.7	24.8		As	6	BC
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	pH
0	25.60	32.19	4.90	0.18	-	6.75	8.38
10	25.58	32.12	4.92	0.13	0.27	6.21	8.30
20	24.55	32.60	5.02	0.13	0.76	11.88	8.30
30	21.50	33.53	5.49	0.18	0.14	6.75	8.21
50	20.81	33.18	5.39	0.20	0.92	12.42	8.26
75	20.75	34.00	5.22	0.38	0.30	7.56	8.25
85	15.85	34.41	4.45	1.17	1.07	11.88	8.20

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	13	12:40	84	2	21	NE 1	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	4	1011.6	25.5		As	B	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	25.80	32.27	50	15.30	33.80		
10	25.50	32.17	75	14.58	34.45		
20	24.92	32.25	80	13.30	34.52		
30	17.91	33.19					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	13	14:20	85	2	23	NE 1	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	4	1015.5	25.9		As	7	BC
Z m	T C	S ‰	O ₂ %	PO ₄ - P μg-at/L	NO ₂ - N μg-at/L	SiO ₂ - Si μg-at/L	PH
0	26.10	32.12	5.56	0.29	0.16	6.21	8.19
10	26.05	32.07	4.73	0.14	0.86	13.23	8.31
20	25.68	32.13	4.83	0.14	0.08	8.10	8.40
30	20.30	33.33	6.15	0.38	0.11	12.15	8.47
50	15.15	34.43	4.77	0.25	0.81	19.17	8.50
75	14.60	34.46	4.92	0.54	0.24	7.56	8.43
83	14.55	34.47	4.92	0.63	0.32	15.12	8.44

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	13	15:50	72	4	21	NE 2	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	4	1011.5	26.2		As	7	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	24.05		32.10	30	22.55		32.04
10	25.75		32.04	50	18.79		34.35
20	25.72		32.04	70	16.73		34.41

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	13	17:20	95	4	20	NE 2	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	5	1011.0	26.2		As	9	C
Z m	T °C	S ‰	O ₂ %	PO ₄ -P µg-at/L	NO ₂ -N µg-at/L	SiO ₂ -Si µg-at/L	PH
0	26.01	32.21	4.73	0.13	0.08	12.96	8.41
10	25.93	32.29	4.96	0.14	0.16	9.45	8.45
20	25.44	32.29	6.17	0.31	0.24	12.42	8.35
30	16.47	32.19	5.11	0.72	0.57	3.10	8.36
50	12.78	34.04	5.20	0.86	0.35	12.96	8.35
75	12.61	34.05	5.20	0.86	-	11.88	8.36
90	12.53	34.05	4.83	0.25	-	9.18	8.38

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	13	18:50	82	4	19	NE 3	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	5	1010.9	26.0		As	10	C
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	25.79	32.23	30	17.66	33.95		
10	25.62	32.53	50	12.30	33.85		
20	25.40	33.72	75	12.30	33.82		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	13	20:25	70			NE 3	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	5	1010.9	26.2		As	10	C
Z m	T °C	S ‰	C ₂ %	PO ₄ -P µg-at/L	NO ₂ -N µg-at/L	SiO ₂ -Si µg-at/L	PH
0	25.78	32.50	5.02	0.18	0.16	6.75	8.39
10	25.70	32.55	4.83	0.09	0.41	8.10	8.40
20	25.30	32.55	5.02	0.16	0.14	11.88	8.42
30	25.70	32.93	4.92	0.14	0.22	12.15	8.40
50	22.51	32.49	5.85	0.07	2.40	10.80	8.35
68	12.90	33.83	5.58	1.04	0.14	15.12	8.31

10월 (October)

조사선 태백산 (Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	10	10:10	82	5	8	W 1	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	1	1012.0	23.4		As	10	C

Z	T	S	Z	T	S
m	°C	‰	m	°C	‰
0	21.55	31.32	30	16.41	32.66
10	22.60	31.50	50	13.80	33.60
20	21.28	31.91	80	13.55	33.83

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	10	11:20	92	5	8	W 1	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	1	1012.0	23.7		As	10	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	21.68	31.39	50	14.15	34.20		
10	21.46	31.38	75	14.10	34.24		
20	20.65	31.82	90	14.06	34.22		
30	15.11	33.59					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	10	12:25	90	5	8	W 1	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	2	1011.5	23.5		As	9	C
Z m	T C		S ‰	Z m	T C		S ‰
0	22.45		31.35	50	17.15		34.17
10	21.41		31.44	75	14.07		34.14
20	20.98		31.59	88	14.09		34.21
30	15.13		33.80				

St.No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	10	13:45	90	5	7	W 1	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	3	1011.0	23.2		As	8	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	21.68	31.42	30	14.07	34.04		
10	21.38	31.33	50	13.98	34.15		
20	21.20	31.38	75	13.80	34.16		

St.No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	10	15:00	85	5	7	NW 1	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1010.5	23.5		As	9	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	21.50	31.37	30	14.28	34.14		
10	21.50	31.30	50	14.30	34.25		
20	21.15	31.91	75	14.35	34.25		

St. No.	Date	Time	Depth	Water Color .	Water Trans.	Wave	Swell
07	10	16:25	80	5	8	NW 2	NW 3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1010.5	22.7		As	9	C
Z m	T °C		S ‰	Z m	T °C		S ‰
0	21.23		31.68	30	15.02		34.19
10	21.22		31.63	50	14.80		34.30
20	21.09		31.68	75	14.70		34.32

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	10	17:37	73	5	8	NW 3	NW 4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1011.0	22.5		Ns	10	C
Z m	T °C		S ‰	Z m	T °C		S ‰
0	21.18		31.81	30	14.70		34.20
10	21.23		31.73	50	14.74		34.28
20	21.05		31.73	70	14.70		34.30

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	10	18:40	70			NW 3	NW 4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1013.0	22.0				C
Z m	T °C		S ‰	Z m	T °C		S ‰
0	21.01		31.63	30	14.50		34.02
10	20.20		33.25	50	14.49		34.09
20	18.28		33.86	68	14.26		34.08

12월 (December)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	16	02:57	83			N 2	N 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	2	1031.5	4.2		Gi	2	B
Z m	T C		S ‰	Z m	T C		S ‰
0	17.40		33.85	50	17.31		33.81
10	17.21		33.84	75	17.18		33.80
20	17.23		33.82	80	15.77		33.52
30	17.26		33.82				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	16	04:11	94			E 2	E 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1031.0	47		Gi	4	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	17.50		33.84	50	17.20		33.82
10	17.12		33.83	75	-		33.83
20	17.19		33.82	90	17.18		33.83
30	17.26		33.82				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	16	05:37	89			E 2	E 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1030.4	5.2		Gi	7	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	17.11		33.82	30	17.33		33.80
10	17.20		33.81	50	17.27		33.81
20	17.22		33.82	75	17.22		33.84

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	SW
05	16	06:20	82			SW 1	SW
Wind		Baro.	Air Temp.		Cloud		Wear
Direction	Force		Dry	Wet	Type	Amount	
SW	1	1029.6	6.8		As	7	B
Z m	T C		S ‰	Z m	T C		S ‰
0	16.30		33.81	30	17.33		33.80
10	17.34		33.80	50	17.34		33.83
20	17.36		33.81	75	17.32		33.83

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swe
06	16	07:40	80	5	12	SW 2	SW
Wind		Baro.	Air Temp.		Cloud		Wear
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1030.2	7.4		As	9	
Z m	T C		S ‰	Z m	T C		S ‰
0	17.40		33.82	30	17.46		33.81
10	17.41		33.82	50	17.42		33.82
20	17.39		33.82	75	17.31		33.82

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swe
07	16	09:25	74	5	14	SW 2	SW
Wind		Baro.	Air Temp.		Cloud		Wear
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1030.0	8.1		As	10	C
Z m	T C		S ‰	Z m	T C		S ‰
0	16.94		33.80	30	17.27		33.82
10	17.22		33.79	50	17.26		33.81
20	17.26		33.83	70	17.20		33.81

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	16	10:52	78	4	17	SW 2	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2		1030.0	8.7		Ac	
Z		T	S	Z	T	S	
m		C	‰	m	C	‰	
0		16.82	33.79	30	17.29	33.81	
10		17.11	33.80	50	17.29	33.85	
20		17.24	33.80	75	17.14	33.92	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	16	12:33	72	3	19	SW 2	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2		1030.5	11.1		As	
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	16.18		33.82	30	17.33	33.81	
10	17.15		33.82	50	17.30	33.81	
20	17.29		33.82	70	17.33	33.91	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	16	13:58	72	4	18	SW 2	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1031.0	12.2		As	10	C
Z m	T C		S ‰	Z m	T C		S ‰
0	16.94		33.86	30	17.51		33.85
10	17.42		33.86	50	17.39		33.84
20	17.49		33.86	70	17.09		33.85

314 선 해 양 관 측 성 적

OCEANOGRAPHIC DATA, LINE 314

2월 (February)

조사선 태백산 (Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
00	13	12:40	170	4	15	NW 4	NW 4						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW	4	1015.0	8.9		Ns	10	R						
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L
0	16.00	34.36	5.43	0.50	—	3.24	75	15.99	34.32	5.33	0.45	0	2.43
10	15.99	34.31	5.33	0.56	0.27	1.62	100	16.01	34.32	5.33	0.29	0	1.35
20	16.01	34.32	5.46	0.45	0	3.51	125	16.07	34.33	5.28	0.36	0.11	4.05
30	16.01	34.33	5.32	0.32	0.30	2.97	150	16.10	34.33	5.30	0.43	0.30	2.97
50	15.99	34.32	5.30	0.29	0	5.13							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swall
01	16	07:10	145			NE 2	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1012.0	12.5		Ns	10	R
Z		T	S	Z	T	S	
m		°C	‰	m	°C	‰	
0		16.00	34.28	75	16.37	34.30	
10		16.40	34.29	100	16.23	34.31	
20		16.40	34.30	125	16.00	34.30	
30		16.40	34.33	140	15.90	34.30	
50		16.35	34.32				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
02	16	09:05	120	4	12	NE 2	E 1						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NE	2	1011.5	13.0		Ns	10	R						
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L
0	16.00	34.29	5.60	0.41	0.27	5.13	50	16.00	34.31	5.23	0.38	0	0
10	16.05	34.28	5.35	0.38	0.03	4.59	75	16.20	34.27	5.25	0.36	0	4.59
20	16.00	34.28	5.24	0.38	0.16	3.78	100	16.17	34.29	5.23	0.31	0	2.70
30	16.01	34.29	5.43	0.49	0.05	1.35	115	15.78	34.27	5.31	0.74	0.08	4.32

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	16	10:45	105	4	12	NE 2	E 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE		2	1011.5	13.5	Ns	10	R
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	16.43	34.29	50	16.39	34.29		
10	16.46	34.32	75	16.40	34.30		
20	16.38	34.28	100	16.40	34.29		
30	16.39	34.28					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell								
04	16	12:25	107	4	13	NE 2	NE 2								
Wind		Baro.	Air Temp.		Cloud		Weather								
Direction	Force		Dry	Wet	Type	Amount									
NE	3	1011.0	13.5		Ns	10	R								
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	NO ₃ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	NO ₃ -N μg-at/L	SiO ₂ -Si μg-at/L
0	16.40	34.26	6.68	0.25	0.14	5.67		50	15.78	34.28	5.32	0.41	0.16	3.51	
10	16.00	34.25	5.34	0.27	0	2.70		75	15.80	34.27	5.38	0.45	0	2.70	
20	16.00	34.25	-	0.40	0.84	3.78		100	15.70	34.19	5.33	-	-	-	
30	15.96	34.27	5.32	0.25	0	5.40									

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	16	13:55	105	4	12	NE 2	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1011.0	13.5		Ns	10	R
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	15.86	34.26	50	15.69	34.27		
10	15.93	34.25	75	15.63	34.27		
20	15.70	34.27	100	15.70	34.28		
30	15.75	34.26					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
06	16	16:05	110	4	12	NE 3	NE 4						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NE	4	1011.0	13.0		Ns	10	R						
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	%	µg-at/L	µg-at/L	µg-at/L	m	°C	‰	%	µg-at/L	µg-at/L	µg-at/L
0	15.82	34.27	5.53	0.41	0	2.97	50	15.69	34.28	5.23	0.23	0	2.43
10	15.71	34.27	5.34	0.36	0	3.24	75	15.62	34.26	5.28	0.18	0.14	4.05
20	15.70	34.27	5.29	0.59	0	2.70	100	15.29	34.27	5.43	0.32	0	4.32
30	15.70	34.27	5.25	0.31	0.08	1.89							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
	21	13:10	115	4	10	NW 2	NW 3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1020.7	6.5		Ns	10	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	14.60	34.32	50	14.60	34.29		
10	14.61	34.30	75	14.56	34.30		
20	14.60	34.29	100	14.50	34.30		
30	14.59	34.29					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
08	21	14:40	100	4	10	NW 2	NW 3						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW	3	1020.7	6.6		Ns	10	C						
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	%	µg-at/L	µg-at/L	µg-at/L	m	°C	‰	%	µg-at/L	µg-at/L	µg-at/L
0	14.60	34.29	5.62	1.13	0.05	5.13	50	14.67	34.27	5.33	5.49	0.14	5.13
10	14.61	34.27	5.48	0.34	0.05	2.70	75	14.78	34.26	5.52	0.72	0	5.40
20	14.59	34.28	5.33	0.16	0.08	0.70	95	14.70	34.27	5.63	0.20	0	1.35
30	14.58	34.27	5.31	2.07	0	3.78							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	21	16:30	80	5	8	NW 2	NW 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1020.7	6.0		Ns	10	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	14.20	34.26	30	14.34	34.28		
10	14.36	34.25	50	14.55	34.26		
20	14.33	34.26	75	14.58	34.24		

St.No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
10	21	18:25	68			NW 2	NW 2						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW	3	1020.5	5.7		Ns	10	C						
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	14.42	34.29	5.58	0.25	0	4.59	30	14.37	34.28	5.52	0.20	0.16	3.78
10	14.39	34.29	5.53	-	-	-	50	14.38	34.28	5.53	0.05	0	4.05
20	14.38	34.29	5.53	0.25	0	4.05							

4월 (April)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
00	13	23:10	160			SE 2	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1025	16.1			5	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	17.00	34.68	75	16.21	34.61		
10	17.16	34.61	100	16.05	34.60		
20	17.02	34.58	125	15.91	34.59		
30	16.60	34.58	150	15.60	34.59		
50	16.58	34.62					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swall
01	14	01:10	140			SE 2	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1022.5	16.2		As	6	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	17.20		34.63	50	16.68		34.63
10	16.20		34.63	75	16.58		34.62
20	16.85		34.64	100	16.49		34.66
30	16.66		34.64	125	16.41		34.61

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swall
02	14	03.20	110			SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1019.5	14.8		As	10	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	16.70		34.64	50	16.42		34.61
10	16.71		34.64	75	16.41		34.62
20	16.85		34.64	100	16.47		34.61
30	16.55		34.61				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swall
03	14	04:20	110			SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1023.0					
Z m	T C		S ‰	Z m	T C		S ‰
0	15.98		34.60	50	15.52		34.61
10	15.90		34.60	75	15.40		34.60
20	15.68		34.61	100	15.27		34.52
30	15.63		34.62				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	14	06:35	100			SE 2	SE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1023.0	10.5				R
Z m	T °C		S ‰	Z m	T °C		S ‰
0	15.62		34.57	50	15.48		34.57
10	15.77		34.57	75	15.40		34.57
20	15.64		34.57	100	15.38		34.55
30	15.57		34.58				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	14	08:37	100			SE 4	SE 4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1019.0	15.4				R
Z m	T °C		S ‰	Z m	T °C		S ‰
0	15.84		34.61	50	15.60		34.52
10	15.83		34.62	75	15.50		34.59
20	15.75		34.57	100	15.41		34.60
30	15.63		34.61				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	16	08:35	110	5	13	SW 2	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1013.0	16.2		As	6	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	15.58		34.53	50	15.61		34.57
10	15.83		34.33	75	15.60		34.57
20	15.59		34.54	100	15.62		34.44
30	-		34.43				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	16	11:05	105			SW 2	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1013.0	15.3		As		B
Z m	T C		S ‰	Z m	T C		S ‰
0	15.60		34.57	50	15.19		34.00
10	15.53		34.57	75	15.21		34.57
20	15.31		34.59	100	15.20		34.57
30	15.37		34.57				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	16	13:10	90	5	14	NE 2	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1023.0	15.0		As	10	C
Z m	T C		S ‰	Z m	T C		S ‰
0	15.48		34.57	50	15.00		34.56
10	15.36		34.56	75	14.98		34.56
20	15.25		-	90	14.99		34.56
30	15.7		34.56				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	16	15:10	80	5	10	SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1012.0	14.2		As	10	C
Z m	T C		S ‰	Z m	T C		S ‰
0	15.46		34.57	30	14.79		34.56
10	15.11		34.56	50	14.40		34.54
20	14.81		34.53	75	14.08		34.52

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	16	17:12	80	5	10	SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1010.0	14.0				C
Z m	T C		S ‰	Z m	T C		S ‰
0	14.90		34.57	30	14.00		34.56
10	14.95		34.56	50	14.46		34.56
20	14.83		34.56	75	14.44		34.55

6월 (June)

조사선 태백산 (Tae Bae San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
00	10	12:50	160	2	16	W 1	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	3	1008.5	21.0				F
Z m	T C		S ‰	Z m	T C		S ‰
0	20.61		33.46	75	17.45		34.47
10	20.50		33.79	100	16.05		34.43
20	20.20		33.79	125	15.80		34.54
30	20.07		34.24	150	14.33		34.55
50	19.80		34.36				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	10	11:00	140	3	12	W 1	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	1	1008.5	21.8				F
Z m	T C		S ‰	Z m	T C		S ‰
0	20.30		32.60	75	15.51		34.05
10	19.90		32.83	100	14.60		34.38
20	19.80		33.23	125	14.60		34.55
30	16.72		33.77	135	14.55		34.57
50	15.35		33.72				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	10	09:10	125	3	10	SW 1	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	1	1007.5	22.0				F
Z m	T °C		S ‰	Z m	T °C		S ‰
0	20.30		32.67	50	17.49		34.34
10	20.07		32.61	75	16.30		34.57
20	19.35		32.85	100	15.24		34.46
30	18.80		33.89	120	14.68		34.58

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	10	07:30	100	3	14	SW 1	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	1	1008.0	18.6				F
Z m	T °C		S ‰	Z m	T °C		S ‰
0	20.07		33.92	50	18.75		34.47
10	20.03		33.87	75	15.98		34.60
20	19.94		34.26	98	15.00		34.47
30	19.00		34.47				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	9	13:00	100	2	17	W 2	W 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	2	1008.0	21.8		Cl	2	B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	20.05		33.54	50	19.75		33.78
10	19.98		33.69	75	16.86		34.34
20	19.79		33.69	98	15.63		34.57
30	19.87		33.68				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	9	09:50	105	2	16	W 1	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	2	1003.0	22.8		Cl	2	B
Z m	T C		S ‰	Z m	T C		S ‰
0	19.81		33.68	50	18.20		34.16
10	19.66		33.63	75	15.65		34.54
20	19.53		33.65	100	14.81		34.57
30	19.40		33.71				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	9	08:00	110	3	8	W 1	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	2	1005.4	22.8		As	3	BG
Z m	T C		S ‰	Z m	T C		S ‰
0	19.70		33.90	50	16.23		34.49
10	19.50		33.86	75	14.83		34.57
20	19.50		33.86	100	14.65		34.55
30	19.30		33.86				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	9	06:25	90			W 1	W 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	2	1005.0	20.6				
Z m	T C		S ‰	Z m	T C		S ‰
0	19.30		33.99	50	17.80		34.26
10	19.31		34.00	75	14.50		34.50
20	19.28		33.98	85	14.23		34.55
30	19.00		33.95				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	9	04:30	90			W 1	W 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	3	1004.0	19.2				
Z m	T C	S ‰	Z m	T C	S ‰		
0	19.35	34.22	50	14.50	34.44		
10	18.93	34.24	75	13.85	34.38		
20	18.75	34.24	85	13.84	34.39		
30	17.50	34.41					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	9	02:50	80			W 1	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	3	1003.6	18.6				
Z m	T C	S ‰	Z m	T C	S ‰		
0	18.85	34.32	30	18.03	34.46		
10	18.83	34.32	50	14.80	34.47		
20	18.69	34.30	75	14.60	34.24		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	9	01:05	75			W 1	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	2	1003.5	19.2				
Z m	T C	S ‰	Z m	T C	S ‰		
0	18.85	34.36	30	18.50	34.35		
10	18.85	34.35	50	15.80	34.52		
20	18.65	34.33	70	14.80	34.49		

8 월 (August)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
00	14	20:45	140			SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	1	1013.5	28.8		Cu	4	BC
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	pH
0	28.14	33.03	4.68	0.09	0.51	8.10	8.50
10	27.11	33.00	4.67	0.05	0.84	9.45	8.55
20	26.96	33.54	4.68	0.04	1.08	7.56	8.58
30	26.90	33.59	5.49	0	0.14	12.69	-
50	24.60	34.25	4.81	0.02	0.16	8.64	8.47
75	17.83	34.52	4.26	0.81	0.22	9.18	8.34
100	15.09	34.61	4.10	0.18	0.65	11.61	8.23
125	14.80	34.57	4.05	0.25	0.41	12.15	8.25
135	14.76	34.61	4.07	0.34	0.43	9.99	8.18

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	14	1835	125	3	25	SE 1	SE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1013.5	28.5		Cu	4	BC
Z	T		S	Z	T	S	
m	°C		‰	m	°C	‰	
0	27.70		32.44	50	24.66	34.37	
10	26.95		32.50	75	15.90	34.51	
20	26.75		32.93	100	14.85	34.61	
30	26.70		33.93	120	14.80	34.61	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	14	16:35	127	3	25	SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1015.0	28.8		Cu	3	BC
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	pH
0	27.27	32.26	5.21	0.04	0.81	9.99	8.47
10	26.90	32.19	4.82	0.11	0.76	8.10	8.51
20	26.73	32.35	5.88	-	-	-	-
30	25.70	32.80	5.84	0.02	0.14	-	8.45
50	23.46	34.11	4.26	0.29	0.31	8.10	8.39
75	18.25	34.40	4.92	0.63	0.38	8.37	8.38
100	14.93	34.41	5.77	0.45	0.38	11.34	8.38
125	14.43	33.99	5.59	0	0.22	7.02	8.38

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	14	14:30	110	3	23	SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1014.3	27.4		Cu	3	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	27.50	32.50	50	17.21	34.15		
10	26.66	32.41	75	15.43	34.42		
20	26.05	33.08	100	14.79	34.46		
30	24.00	33.52					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	14	12:30	105	3	23	SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2		26.6		Cu	4	
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	pH
0	26.70	32.42	5.11	0.36	0	5.40	8.36
10	26.46	32.56	-	0.04	0.24	6.75	8.35
20	26.01	33.87	5.30	0	0.49	11.07	8.41
30	19.95	34.06	5.96	0.25	0.16	9.72	8.40
50	16.33	34.27	5.37	0.38	0.41	12.96	8.38
75	15.15	34.51	5.19	0.63	0.54	11.61	8.31
100	14.01	34.45	5.13	0	2.51	12.96	8.47

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	14	10:20	100	4	23	SE 2	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2		1025.0	25.8		Cu	
Z m		T C	S ‰	Z m		T C	S ‰
0		26.33	32.61	50		15.80	34.24
10		26.43	32.66	75		14.16	34.33
20		26.33	33.13	98		14.07	34.35
30		24.41	33.90				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	14	08:20	98	4	23	SE 2	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1025.0	25.8		Cu	2	B
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	pH
0	26.12	32.10	5.87	0.05	0.14	7.56	8.35
10	26.62	31.99	5.96	0.13	0.05	7.83	8.40
20	25.70	32.18	5.68	0.05	0.41	6.21	8.32
30	23.94	33.91	5.29	0.38	0.05	8.10	8.40
50	17.02	34.26	5.68	0.18	2.03	7.56	8.37
75	14.23	34.41	5.29	0.61	0.20	10.26	8.29
95	14.09	34.43	5.02	0.27	1.32	9.45	8.29

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	14	06:20	105			SE 2	SE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1025.5	26.0				B
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	26.36	32.48	50	15.46	33.12		
10	26.22	32.39	75	14.31	34.36		
20	25.80	32.36	100	14.22	34.40		
30	24.50	-					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	14	04:15	105			SE 1	SE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1025.3	26.0				B
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	pH
0	26.00	32.12	4.83	0.18	0	4.05	8.15
10	26.33	32.03	4.83	0.18	0.19	8.64	8.31
20	24.90	32.32	5.11	0.18	0.95	7.83	8.40
30	18.60	33.47	5.43	0.22	0.14	8.64	8.38
50	14.52	34.37	4.83	0.36	0.24	14.31	8.27
75	14.15	34.42	4.64	0.31	0.22	16.20	8.20
100	14.20	34.32	4.62	0.43	0.27	18.09	8.30

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	14	02:10	80			SE 1	SE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1025.4	25.8				B
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	26.38	31.96	30	23.20	31.99		
10	25.91	31.94	50	21.10	34.02		
20	24.48	32.27	75	14.73	34.46		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	14	00:05	80			SE 1	SE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1012.0	26.2				B
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	pH
0	26.44	32.19	4.83	0.32	0.16	16.20	8.40
10	25.75	32.02	5.75	0.09	0.11	12.15	8.37
20	22.20	32.96	5.93	0.18	0.08	12.15	8.48
30	14.45	34.28	4.76	0.90	2.40	7.56	8.34
50	14.21	34.37	4.76	0.31	0.92	12.15	8.25
75	12.67	34.37	4.84	0.09	0.14	7.83	8.13

10월 (October)

조사선 태백산 (Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	13	15:30	129	4	15	N 2	N 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	3	1016.5	21.6		C1	2	B
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	23.20	32.88	50	22.16	33.64		
10	23.05	32.83	75	21.18	33.37		
20	23.68	33.17	100	19.21	34.36		
30	23.85	33.27	125	17.00	34.53		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	13	13:30	130	3	17	N 2	N 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	3	1018.0	21.5				B
Z m	T C		S ‰		Z m	T C	S ‰
0	24.00		33.51		50	22.52	34.34
10	24.40		33.53		75	18.70	34.47
20	24.45		33.60		100	18.51	34.41
30	24.23		34.12		125	16.28	34.40

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	13	11:45	128	3	18	N 2	N 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	3	1018.0	20.3				B
Z m	T C		S ‰		Z m	T C	S ‰
0	22.73		32.91		50	22.86	32.99
10	22.76		32.91		75	20.40	33.78
20	22.75		32.86		100	19.60	34.43
30	22.87		32.90		125	17.58	34.43

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	13	09:50	110	3	18	N 1	N 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	3	1018.0	20.0				B
Z m	T C		S ‰		Z m	T C	S ‰
0	22.70		33.05		50	22.84	32.98
10	22.83		32.98		75	18.92	34.26
20	22.81		32.98		100	17.63	34.54
30	22.84		32.97				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	13	08:10	100	3	17	SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1018.0	19.5				B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	22.48	32.97	50	22.21	32.88		
10	22.56	32.95	75	14.05	33.38		
20	22.30	32.93	98	15.80	34.50		
30	22.49	32.96					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	11	07:30	100			NW 4	NW 4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1012.0	15.2		As	4	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	21.61	32.58	50	15.76	33.28		
10	21.60	32.56	75	15.68	34.26		
20	21.00	32.64	100	15.67	34.52		
30	16.10	32.69					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	11	05:20	85			NW 4	NW 4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1012.2	15.2				BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	21.89	32.56	30	18.04	32.54		
10	23.18	32.88	50	15.80	32.53		
20	22.10	32.54	75	14.89	33.51		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	11	02:20	85			NW 4	NW 4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1012.4	15.2				BC
Z m	T C		S ‰	Z m	T C		S ‰
0	21.10		31.11	30	20.80		31.13
10	21.05		31.06	50	15.20		33.23
20	21.09		31.06	75	13.98		33.41

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	11	01:10	78			NW 4	NW 4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1012.0	16.0				BC
Z m	T C		S ‰	Z m	T C		S ‰
0	21.00		31.19	30	17.84		32.29
10	21.05		31.10	50	15.18		33.41
20	21.07		31.12	75	14.18		33.46

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	10	23:25	80			NW 3	NW 4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1012.0	16.2				C
Z m	T C		S ‰	Z m	T C		S ‰
0	21.02		31.33	30	21.03		31.28
10	21.18		31.30	50	14.32		34.10
20	21.12		31.24	75	14.27		34.23

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swe
10	10	21:40	77			NW 3	NW 4
Wind		Baro.	Air Temp.		Cloud		Weathe
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1012.0	18.5				C
Z m	T C		S ‰	Z m	T C		S ‰
0	21.23		31.56	30	15.92		32.19
10	21.29		31.48	50	14.93		33.65
20	21.20		31.47	75	14.14		34.10

12 (December)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
00	11	18:07	132			E 2	E 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	3	1021.1	14.8		Cl	4	B
Z m	T C		S ‰	Z m	T C		S ‰
0	19.50		34.03	50	19.60		34.03
10	19.39		34.04	75	19.57		34.02
20	19.49		34.04	100	19.40		33.98
30	19.57		34.05	125	17.49		34.65

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	11	20:12	127			E 2	E 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	5	1020.8	8.3				
Z m	T C		S ‰	Z m	T C		S ‰
0	19.25		33.98	50	19.36		33.95
10	19.36		33.98	75	19.21		33.94
20	19.29		33.96	100	19.12		33.95
30	19.40		33.96	125	16.12		34.57

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	11	22:08	124			W 2	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	3	1019.9	8.5				
Z m	T C		S ‰	Z m	T C		S ‰
0	18.84		33.83	50	19.05		33.70
10	18.91		33.81	75	19.04		33.90
20	18.87		33.75	100	19.01		34.06
30	18.92		33.74	120	16.78		34.06

St. No.	Date	Time	Depth	Water Color	Water Trans.	Wave	Swell
03	12	00:15	100			W 2	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	3	1019.0	7.2		AC	4	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	20.10		34.41	50	19.93		34.06
10	19.78		34.53	75	19.84		-
20	19.72		33.89	98	19.82		33.83
30	19.69		34.06				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	12	02:25	98			W 2	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	3	1019.0	6.9		Ac	3	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	19.10		-	50	18.85		33.91
10	19.66		-	75	18.11		-
20	19.70		-	95	17.17		34.05
30	19.64		-				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	12	04:40	97			W 2	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	3	1018.8	7.0		Ac	4	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	18.00		33.91	50	18.49		33.87
10	18.47		33.88	75	18.35		33.90
20	18.54		33.87	95	16.56		34.47
30	18.59		33.90				

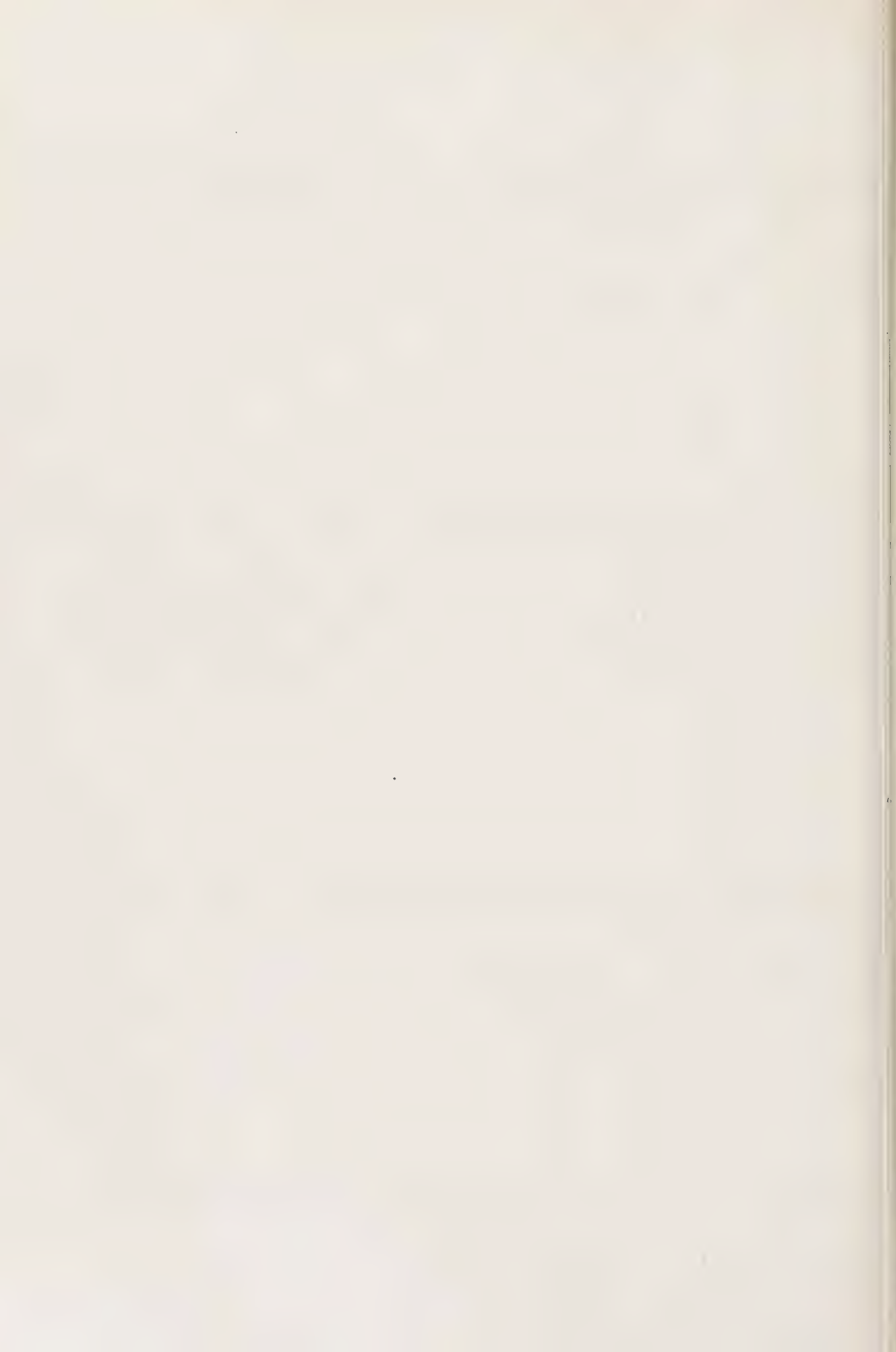
St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	15	05:09	103			N 3	N 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	4	1031.8	8.8		As	7	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	17.70		33.98	50	17.59		33.86
10	17.35		33.90	75	16.96		33.44
20	17.47		33.86	100	16.62		34.44
30	17.51		-				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	15	07:17	93	4	13	N 3	N 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	4	1031.7	9.3		As	7	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	17.80		33.86	50	17.11		34.00
10	17.64		33.82	75	16.87		34.09
20	17.80		33.82	90	16.85		-
30	17.39		33.92				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	15	09:02	92	4	14	N 3	N 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	4	1031.5	10.4		As	8	C
Z m	T C		S ‰		Z m	T C	S ‰
0	16.90		33.91		50	16.86	33.97
10	16.40		33.87		75	16.76	33.99
20	16.72		33.87		90	16.74	33.99
30	16.82		33.92				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	15	11:13	82	5	11	NE 2	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1032.1	10.0		As	10	C
Z m	T C		S ‰		Z m	T C	S ‰
0	16.46		33.90		30	16.88	33.89
10	16.79		33.90		50	16.90	33.90
20	16.90		33.90		75	16.93	34.01

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	15	13:12	88	5	12.5	E 2	E 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1031.9	10.9		As	10	C
Z m	T C		S ‰		Z m	T C	S ‰
0	15.15		33.98		30	16.86	34.04
10	16.44		33.97		50	16.84	34.05
20	16.65		33.97		75	16.83	34.04



서 해 해 양 조 사 성 적

OCEANOGRAPHIC OBSERVATIONS
WESTERN WATERS

1 9 7 2

THE

STORY OF THE

WARRIORS

OF THE

306 선 해 양 관 측 성 적
OCEANOGRAPHIC DATA, LINE 306

2월(February)

조사선 한라산(Han Ra San)

St.No	Date	Time	Depth	Water Color.	Water Trans	Wave	Swell
02	8	07 : 10	25			3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1026.5	5.3	4.6	Cc	1	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	3.95	31.51	20	4.05	32.03		
10	4.00	31.80					

St. No		Date		Time		Depth		Water Color.		Water Trans.		Wave		Swell	
03		8		08 : 35		12		7		1.5		3		3	
Wind				Baro.		Air Temp.				Cloud				Weather	
Direction		Force				Dry		Wet		Type		Amount			
NE		3		1026.5		4.6		5.3		Cc		1		B	
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L		
0	3.92	31.47	6.87	0.93	0.26	27.23	10	3.98	31.85	6.95	0.78	0.09	-		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	8	10 : 15	15	6	1.5	3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	4	1026.5	6.9	4.8	G1	1	B
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	4.49	31.92	13	4.03	32.05		
10	4.08	32.05					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
05	8	11 : 40	43	5	1.5	3	3						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NE	4	1027.5	7.1	5.0	Ci	1	B						
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	3.88	31.85	7.10	0.66	0.09	0.08	30	3.72	31.85	7.10	0.72	0.10	10.16
10	3.60	31.85	7.00	0.63	0.15	10.89	40	4.19	31.94	6.92	0.93	0.69	32.31
20	3.58	-	7.00	0.69	0.07	9.80							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	8	13 : 20	51	4	5	3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	4	1028.0	8.9	7.8	Ci	1	B
Z m		T C	S ‰		Z m	T C	S ‰
0		4.45	31.85		30	4.32	31.98
10		4.35	31.98		45	4.38	32.10
20		4.32	31.98				

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	8	14 : 45	59	4	9	3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	4	1027.0	8.3	6.2	Ci	1	B

Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	5.80	32.07	6.80	0.57	-	3.27	30	5.79	32.27	6.77	0.63	0.12	4.36
10	5.80	32.27	6.52	0.56	0.09	6.17	55	5.88	32.36	6.68	0.51	0.10	4.36
20	5.60	32.27	-	0.63	0.06	6.53							

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	8	16 : 25	64	3	12	2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1026.0	9.2	7.0	Cc	1	B
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	6.12	32.29	30	6.06	32.39		
10	6.20	32.39	50	6.07	32.41		
20	6.05	32.39	60	6.14	32.41		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
09	8	17 : 55	65	3	12	3	2						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NE	3	1026.0	8.6	7.3	Ci	1	B						
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	6.58	32.41	6.40	0.42	0.13	4.36	30	6.55	32.41	6.40	0.56	-	4.36
10	6.58	32.41	6.53	0.57	0.04	3.27	50	6.61	32.56	6.30	0.38	-	6.53
20	6.55	32.41	6.60	0.56	-	3.63	60	6.55	32.57	6.40	0.54	-	5.08

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	8	19 : 35	72			3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1024.5	6.9	5.1	Cs	6	BC
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	7.06	32.45	30	7.00	32.43		
10	6.94	32.38	50	7.02	32.56		
20	7.05	32.48	70	7.08	32.61		

4월 (April)

조사선 한라산 (Han Ra Si)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	8	06 : 30	24	6	2.5	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	3	1020.0	12.0	11.1	C1	5	BC
Z m	T °C		S ‰		Z m	T °C	S ‰
0	6.05		31.06		20	5.37	31.83
10	6.14		31.69				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	8	07 : 50	12	6	1.5	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	2	1020.0	10.9	9.2	C1	5	BC
Z m	T °C		S ‰		Z m	T °C	S ‰
0	6.12		31.73		10	5.98	31.80

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	8	09 : 30	18	6	1.2	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	2	1020.0	13.2	11.9	C1	4	BC
Z m	T °C		S ‰		Z m	T °C	S ‰
0	6.18		31.06		15	6.11	31.73
10	6.01		31.62				

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	8	10 : 50	43	6	3	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1020.5	12.4	11.0	ci	1	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	6.38	31.85	30	5.39	31.91		
10	6.25	31.85	40	5.29	31.91		
20	5.48	31.91					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	8	12 : 25	51	5	4.5	3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1020.0	12.0	11.2	ci	1	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	5.92	31.91	30	5.35	32.02		
10	5.88	32.02	45	5.35	31.94		
20	5.64	32.02					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	8	13 : 50	59	4	4.7	3	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1026.0	10.8	10.1	ci	1	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	5.52	32.00	30	5.12	32.02		
10	5.42	32.00	55	5.07	32.02		
20	5.20	32.00					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	8	15 : 25	64	5	5	4	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1020.0	10.2	9.8	Cc	1	B
Z m	T C		S ‰		Z m	T C	S ‰
0	5.65		32.11		30	5.20	32.27
10	5.60		32.11		50	5.20	32.32
20	5.41		32.11		60	5.20	32.32

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	8	16 : 50	65	5	5	5	5
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1019.5	10.3	9.5			B
Z m	T C		S ‰		Z m	T C	S ‰
0	6.01		31.21		30	5.42	32.41
10	5.81		31.21		50	5.41	32.47
20	5.45		32.39		60	5.41	32.43

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	8	18 : 25	72	5	5	5	5
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1019.5	10.0	9.2			B
Z m	T C		S ‰		Z m	T C	S ‰
0	6.21		32.18		30	5.52	32.41
10	5.92		32.21		50	5.49	32.45
20	5.63		32.36		70	5.48	32.43

6월 (June)

조사선 한라산 (Han Ra San)

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	9	11 : 10	25	7	2.5	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	2	1007.0	24.2	23.2			B
Z m	T °C		S ‰		Z m	T °C	S ‰
0	13.34		32.03		20	13.20	32.21
10	13.20		32.14				

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	9	12 : 30	12	7	2.5	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	2	1006.0	25.8	24.6			B
Z m	T °C		S ‰		Z m	T °C	S ‰
0	14.30		32.21		10	13.52	32.11

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	9	14 : 00	18	7	2.5	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	2	1006.5	27.0	25.0			B
Z m	T °C		S ‰		Z m	T °C	S ‰
0	13.42		31.98		15	12.94	32.83
10	13.16		31.98				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	9	15 : 20	43	6	6.5	3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1006.5	26.7	23.2			B
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	15.75	32.02	30	11.03	32.21		
10	14.62	32.07	40	10.31	32.38		
20	11.95	32.11					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	9	16 : 50	51	6	7	3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1005.5	23.6	22.3			B
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	15.29	31.87	30	10.46	32.43		
10	14.47	32.03	45	9.16	32.54		
20	12.40	32.38					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	9	18 : 10	59	5	8	3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1006.0	23.5	22.4			B
Z m	T C	S ‰	Z m	T C	S ‰		
0	16.75	32.34	30	8.10	32.57		
10	13.72	32.38	50	8.46	32.57		
20	8.81	32.52					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	9	19 : 40	64	5	9.5	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	3	1006.5	21.6	21.3	Cc	1	B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	17.00		32.43	30	11.85		32.92
10	14.41		32.50	50	11.18		32.99
20	13.04		32.54	50	7.73		32.74

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	9	21 : 00	65			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	3	1007.5	20.7	19.4			B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	17.65		32.59	30	12.29		32.88
10	13.38		32.77	50	11.52		33.01
20	12.88		32.83	60	7.38		33.04

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	9	22 : 30	72			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1007.0	20.4	19.2			B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	17.80		32.83	30	7.31		33.12
10	13.98		32.79	50	7.42		33.12
20	11.98		32.79	70	7.33		33.15

8월 (August)

조사선 한라산 (Han Ra: San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	16	05 : 30	22			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	3	1012.0	25.4	24.8	St	10	F
Z m	T C	S ‰	Z m	T C	S ‰		
0	21.40	30.81	20	20.98	30.82		
10	21.34	30.81					

St. No.		Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell					
03		16	07 : 05	15	8	2	2	2					
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
S		2	1012.5	25.1	24.3	St	10	F					
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	20.86	31.13	4.90	1.53	0.10	11.25	10	20.58	31.17	5.60	1.43	0.13	23.23

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	16	08 : 50	23	4	8	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1012.5	26.9	26.8	St	10	F
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	22.46	31.37	20	19.84	31.31		
10	21.96	31.26					

St.No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
05	16	10 : 25	43	5	4.4	2	2						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
S	2	1012.5	26.8	26.0	St	10	F						
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	21.72	31.56	-	1.50	0.24	26.14	30	17.31	31.24	5.10	1.47	0.12	19.97
10	19.70	31.60	5.60	1.55	0.02	18.15	40	17.21	31.47	5.10	1.53	0.10	26.86
20	18.25	31.53	5.20	1.53	0.13	29.77							

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	16	12 : 10	52	4	5	2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	3	1012.5	26.9	26.1	St	10	F
Z m	T °C	S ‰					
0	21.58	30.81					
10	20.43	31.53					
20	17.70	31.56					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	S well						
07	16	13 : 45	59	3	13	2	3						
Wind		Baro .	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
S	3	1012.5	28.1	27.2	Ns	10	C						
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PC ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	22.97	31.55	5.00	1.26	0.02	42.11	30	18.12	31.85	6.10	1.38	0.10	19.97
10	20.70	31.78	5.30	1.58	0.02	30.49	55	15.02	31.73	5.30	1.41	0.09	26.14
20	20.00	31.94	5.10	1.68	-	33.76							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	16	15 : 30	64	3	13	2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1013.5	28.9	27.8	Ns	10	C
Z m	T °C		S ‰		Z m	T °C	S ‰
0	23.83		31.76		30	13.18	31.80
10	20.98		32.00		50	11.75	31.76
20	16.04		32.09		60	10.87	31.82

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
09	16	17 : 05	62	3	12	2	4						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
SE	3	1013.0	28.5	27.8	Ns	10	C						
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	23.25	30.77	4.90	1.29	-	10.16	30	18.18	32.07	5.50	1.50	0.14	18.88
10	21.24	31.78	5.60	1.20	0.10	32.31	50	14.04	31.91	5.60	1.47	0.70	17.79
20	22.20	31.96	5.3	1.44	0.02	18.88	60	10.43	31.85	5.60	1.50	0.09	17.06

St. No.	Date	Time	Depth	Water Color	Water Trans.	Wave	Swell
10	16	18 : 50	72	3	11	2	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1013.0	28.2	27.5	Ns	8	C
Z m	T °C		S ‰		Z m	T °C	S ‰
0	23.45		31.15		30	13.51	32.02
10	20.85		31.60		50	9.08	31.91
20	16.68		31.82		70	9.02	31.91

10 월(October)

조사선 한라산 (Han Ra San)

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	8	07 : 05	23	7	2.5	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1024.1	24.0	22.0			B
Z m	T C	S ‰	Z m	T C	S ‰		
0	19.15	30.93	20	19.01	30.97		
10	19.10	30.91					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	8	08 : 40	10	7	3	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1024.0	25.2	24.3			B
Z m	T C	S ‰	Z m	T C	S ‰		
0	18.51	31.20	8	18.49	31.35		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	8	10 : 10	17	6	3	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1024.0	26.6	25.3			B
Z m	T C	S ‰	Z m	T C	S ‰		
0	18.97	31.02	15	18.10	31.15		
10	18.39	31.04					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	8	11 : 40	40	4	10	2	I
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1025.0	26.4	26.0			B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	19.01		31.82	30	17.90		32.05
10	18.73		31.87	38	17.88		32.05
20	18.45		31.93				

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	8	13 : 25	54	4	12	2	I
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1024.0	25.0	23.9	Ns	9	C
Z m	T °C		S ‰	Z m	T °C		S ‰
0	19.10		31.58	30	14.60		32.21
10	18.47		31.51	50	13.86		32.34
20	18.20		31.53				

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	8	14 : 30	62	4	17	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1023.5	26.9	26.2	Ns	8	C
Z m	T °C		S ‰	Z m	T °C		S ‰
0	18.97		31.58	30	17.80		31.65
10	18.34		31.44	50	11.88		32.41
20	18.30		31.53	60	11.15		32.41

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	8	16 : 35	63	4	13	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1024.0	25.4	25.2	Ns	8	C
Z m	T C		S ‰	Z m	T C	S ‰	
0	19.57		31.73	30	17.64	31.74	
10	18.29		31.76	50	9.34	32.47	
20	18.15		31.64	60	9.33	32.47	

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	8	18 : 20	64	3	17	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1023.0	25.0	24.2	Ns	7	BC
Z m	T C		S ‰	Z m	T C	S ‰	
0	19.32		31.65	30	17.59	31.76	
10	18.10		31.60	50	8.91	32.03	
20	17.90		31.64	60	8.94	32.43	

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	8	19 : 50	70	3	20	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1022.5	25.0	24.0	Ns	3	BC
Z m	T C		S ‰	Z m	T C	S ‰	
0	20.45		31.62	30	18.06	31.56	
10	19.72		31.67	50	13.84	31.73	
20	18.81		31.64	65	8.37	32.50	

307 선 해양 관측 성적
OCEANOGRAPHIC DATA, LINE 307

2월 (February)

조사선 한라산 (Han Ra San)

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
03	9	09 : 35	38	6	4	4	3						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
SE	4	1023.0	7.5	5.6	Cs	10	C						
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	4.20	32.45	6.92	0.51	0.09	11.62	20	4.55	32.45	7.00	0.63	0.12	8.71
10	4.55	32.45	6.97	0.51	0.13	11.62							

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	9	08 : 10	35	6	4	3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1023.0	7.1	5.6	Cs	10	C
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	4.10	32.30	20	4.61	32.43		
10	4.62	32.43	30	4.70	32.43		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	9	06 : 25	54			3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	3	1024.0	6.5	5.2	Cs	5	BC

Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	5.80	32.41	7.60	0.17	0.44	3.27	30	5.93	32.56	7.62	0.38	0.07	3.27
10	5.90	32.54	7.00	0.35	0.05	4.36	50	5.92	32.63	7.65	0.41	0.06	3.27
20	5.99	32.56	6.70	0.32	0.06	3.27							

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	9	04 : 55	61			3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	3	1024.0	6.9	5.4	Cl	3	BC
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	5.98	32.50	30	5.97	32.50		
10	6.03	32.50	50	5.90	32.50		
20	6.00	32.50	58	5.91	32.56		

St.No	Date	Time	Depth	Water Color	Water Trans.	Wave	Swell						
07	9	03 : 10	58			3	2						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NE	3	1025.5	6.8	5.0	Cs	6	BC						
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	6.48	32.48	-	0.32	0.07	2.54	30	6.27	32.52	-	0.45	0.06	4.36
10	6.50	32.57	-	0.36	0.09	1.09	50	6.08	32.59	-	0.39	0.06	3.63
20	6.54	32.57	-	0.23	0.59	2.90							

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	9	01 : 40	63			3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1025.0	6.5	5.0	Cs	10	C
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	6.63	32.34	30	6.80	32.52		
10	6.72	32.48	50	6.70	32.52		
20	6.70	32.52	60	6.72	32.61		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
09	8	23 : 55	67			3	2						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NE	3	1026.0	6.4	4.8	Cs	10	C						
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	6.70	32.68	7.05	0.48	0.26	1.82	30	6.81	32.47	6.55	0.48	0.10	3.27
10	6.80	32.39	6.40	0.48	0.06	2.90	50	6.84	32.52	6.50	0.54	0.10	3.63
20	6.91	32.39	6.45	0.48	0.13	2.90	60	6.80	32.63	-	0.48	0.10	4.36

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	8	22 : 25	76			3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1025.5	6.4	5.0	Cs	10	C
Z m		T °C	S ‰	Z m		T °C	S ‰
0		6.00	32.61	30		7.20	32.30
10		7.12	32.59	50		7.00	-
20		7.12	32.63	70		6.98	32.68

4월 (April)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	9	08 : 40	40	6	3.2	5	5
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1019.0	9.5	8.6	Cl	5	BC
Z m		T C	S ‰		Z m	T C	S ‰
0		5.30	31.91		20	5.08	31.89
10		5.05	31.89		35	5.00	31.89

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	9	06 : 30	35	7	2.5	5	5
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1019.0	9.2	8.2	Ci	5	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	5.70	31.91	20	5.12	31.91		
10	5.24	31.91	30	5.05	31.91		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	9	04 : 55	54			5	5
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1019.0	8.8	7.9	Ci	5	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	5.62	32.11	30	5.18	32.25		
10	5.43	32.12	50	5.18	32.91		
20	5.25	32.16					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	9	03 : 30	60			5	5
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1019.0	8.8	7.9	Ci	5	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	5.48	32.09	30	5.45	32.18		
10	5.62	32.12	50	5.45	32.23		
20	5.54	32.16	58	5.42	32.27		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	9	01 : 55	58			5	5
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1019.0	9.0	8.2	Ci	5	BC
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	5.70		31.93	30	5.10		32.32
10	5.67		31.92	55	5.17		32.30
20	5.45		31.21				

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	9	00 : 30	63			5	5
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1019.5	9.2	8.4	Cc	1	B
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	5.53		32.52	30	5.30		32.16
10	5.52		32.16	50	5.33		32.18
20	5.50		32.16	60	4.98		32.70

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	8	22 : 45	65			5	5
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1019.5	9.5	8.3			B
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	5.55		32.09	30	4.91		32.23
10	5.48		32.09	50	4.92		32.27
20	4.92		32.12	62	4.98		32.27

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	8	21:30	76			5	5
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1079.5	10.0	9.2	ci	1	B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	6.20	32.11	30	5.20	32.30		
10	5.90	32.09	50	5.70	32.38		
20	5.20	32.30	70	5.18	32.23		

6월 (June)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	9	08:05	38	7	2.5	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	2	1004.5	21.9	20.3	Cc	1	B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	12.34	32.88	20	12.07	32.88		
10	12.05	32.88	30	12.10	32.88		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	9	05:40	35			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	2	1004.5	19.7	18.6	Cc	1	B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	15.59	32.65	20	12.77	32.61		
10	13.47	32.61	30	11.44	32.63		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	9	04:05	54			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	2	1004.0	18.2	17.3	Cl	1	B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	16.68	32.77	30	10.59	32.86		
10	12.58	32.72	50	8.60	32.86		
20	11.24	32.90					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	9	02:40	61			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	2	1004.0	17.4	16.5	Cl	1	B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	16.20	32.74	30	11.21	32.72		
10	11.80	32.74	50	10.33	32.85		
20	12.97	32.72	58	7.75	32.94		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	9	01:05	58			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	2	1004.0	17.2	16.7	Cc	1	B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	15.85	32.81	30	8.55	32.94		
10	12.86	32.76	50	6.66	33.04		
20	10.55	32.76					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	8	23:40	63			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	3	1003.0	20.0	19.4	Cc	1	B
Z m	T C		S ‰	Z m	T C		S ‰
0	16.92		32.70	30	9.69		32.92
10	14.19		32.70	50	6.78		33.04
20	12.70		32.70	60	6.66		33.17

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	8	22:05	67			3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	3	1004.0	20.4	19.6	Cc	1	B
Z m	T C		S ‰	Z m	T C		S ‰
0	17.50		32.77	30	7.10		33.17
10	14.32		32.83	50	6.95		33.17
20	12.68		32.90	65	7.02		33.21

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	8	20:40	76			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	3	1003.5	20.2	19.8	Ci	1	B
Z m	T C		S ‰	Z m	T C		S ‰
0	17.40		32.97	30	10.65		33.22
10	13.42		32.88	50	7.64		33.22
20	13.82		33.03	70	7.10		33.22

8 월 (August)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
03	16	02:05	38			2	1						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
SW	3	1012.5	26.2	26.7	As	8	C						
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	%	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	%	μg-at/L	μg-at/L	μg-at/L
0	21.24	31.20	5.50	0.95	0.07	23.96	20	20.70	31.15	4.90	1.68	0.10	22.51
10	20.23	31.15	5.30	1.86	0.11	18.15	30	20.42	31.26	5.10	1.77	0.03	16.70

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	15	23:30	35			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1012.5	27.9	27.4	As	8	C
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	20.52	31.33	20	20.15	31.31		
10	20.20	31.35	30	20.12	31.37		

St. No.		Date		Time		Depth		Water Color.		Water Trans.		Wave		Swell	
05		15		21:15		54						2		1	
Wind				Baro.		Air Temp.				Cloud				Weather	
Direction		Force				Dry		Wet		Type		Amount			
SW		3		1013.5		28.5		27.4		As		8		C	
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si		
m	(°C)	‰	%	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	%	μg-at/L	μg-at/L	μg-at/L		
0	21.10	37.60	4.90	0.09	0.05	7.62	30	19.72	31.44	5.30	0.84	0.18	18.88		
10	20.52	31.49	5.40	1.10	0.08	21.05	50	19.72	37.47	5.10	1.02	0.06	6.53		
20	19.82	31.44	5.20	1.10	0.15	13.79									

t. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	15	20:10	61			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1013.5	28.9	28.0	As	8	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	21.88	31.49	30	18.30	31.74		
10	19.91	31.73	50	17.04	31.91		
20	19.58	31.80	58	16.94	31.49		

t. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	15	18:25	60	3	11	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1013.5	28.5	27.6	Ac	4	BC

T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
°C	‰	%	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	%	μg-at/L	μg-at/L	μg-at/L
22.31	32.21	5.30	0.99	0.02	9.80	30	15.30	32.05	5.00	0.93	0.09	13.79
19.82	31.91	5.00	1.02	0.03	23.60	57	13.88	31.98	5.10	0.96	0.06	18.51
19.25	31.89	5.60	1.02	0.06	6.53							

t. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	15	16:50	63	3	13	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1013.5	28.4	27.2	Ac	4	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	23.12	32.02	30	13.98	32.18		
10	19.40	32.05	50	11.73	32.16		
20	18.16	32.20	60	11.62	32.14		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	15	15:05	67	3	10	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1013.0	27.4	26.8	Ns	8	C

Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	%	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	%	μg-at/L	μg-at/L	μg-at/L
0	22.95	32.03	4.90	1.11	-	23.60	30	14.12	32.03	5.10	1.14	0.02	7.99
10	20.55	32.03	5.00	0.95	0.03	11.21	50	9.18	32.11	5.50	1.65	0.07	15.61
20	17.77	31.98	5.20	0.96	0.02	10.16	65	3.20	32.02	5.20	1.11	0.10	10.16

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	15	13:30	76	3	16	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1012.5	27.3	26.7	Ns	8	C
Z m		T C	S ‰	Z m		T C	S ‰
0		22.90	31.98	30		14.66	32.05
10		21.24	31.91	50		8.32	32.03
20		18.49	32.38	70		8.38	32.03

10 월 (October)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	9	10:10	33	6	2.8	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1023.6	24.0	22.8			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	19.20	31.92	20	19.10	31.92		
10	19.21	31.89	30	19.10	31.91		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	9	08:55	36	5	4.2	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1023.5	23.8	21.5			B
Z m	T C		S ‰	Z m	T C		S ‰
0	19.45		32.25	20	19.25		32.27
10	19.35		32.21	34	19.20		32.23

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	9	07:40	54	5	4.5	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1023.2	20.8	19.5			B
Z m	T C		S ‰	Z m	T C		S ‰
0	19.45		32.83	30	17.88		32.59
10	19.10		32.85	50	15.90		33.08
20	19.08		32.86				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	9	06:10	61	5	8	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1023.0	20.5	19.4			B
Z m	T C		S ‰	Z m	T C		S ‰
0	18.22		32.68	30	17.93		32.79
10	18.35		32.72	50	13.40		33.13
20	18.27		32.68	58	12.85		33.13

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	9	04:20	58			1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1023.0	21.5	19.4			B
Z		T	S	Z	T	S	
m		°C	‰	m	°C	‰	
0		18.90	32.09	30	10.80	32.88	
10		18.62	32.00	55	10.60	32.88	
20		18.43	32.11				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	9	03:00	63			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1022.5	19.5	21.8			B
Z		T	S	Z	T	S	
m		°C	‰	m	°C	‰	
0		18.90	31.74	30	17.52	32.12	
10		18.50	32.02	50	7.87	32.81	
20		18.36	32.03	60	7.78	32.85	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	9	01:20	67			1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1021.7	21.2	22.2			B
Z		T	S	Z	T	S	
m		°C	‰	m	°C	‰	
0		19.50	31.71	30	18.82	32.20	
10		19.08	31.71	50	8.75	32.45	
20		19.02	31.67	65	8.49	32.48	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	8	23:30	74			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1022.0	22.1	21.2			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	20.29	31.73	30	19.00	31.98		
10	19.52	31.62	50	8.83	32.50		
20	19.15	31.68	70	8.25	32.56		

308 선 해양 관 측 성 적

OCEANOGRAPHIC DATA, LINE 308

2월 (February)

조사선 한라산 (Han Ra San

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
01	9	14:05	20	7	2	3	3						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
SE	4	1022.6	9.2	7.4	Cs	6	BC						
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	6.10	32.34	6.60	0.60	0.12	6.53	18	6.10	32.56	6.78	0.48	0.07	7.98
10	6.00	32.43	6.60	0.27	0.14	6.53							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	9	15:45	28	7	2.5	3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	4	1020.8	8.7	6.1	Cs	6	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	6.10	32.56	20	6.30	32.59		
10	6.30	32.59	25	6.40	32.61		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
03	9	17:10	49	5	5	3	3						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
N	4	1020.5	8.2	6.0	Cs	6	Bc						
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	6.50	32.59	6.60	0.48	0.17	4.36	30	6.60	32.61	6.50	0.48	0.13	4.36
10	6.60	32.59	6.70	0.38	0.15	2.90	45	6.56	32.61	6.70	0.54	0.10	5.45
20	6.55	32.65	6.60	0.41	0.13	4.36							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	9	18:50	50			4	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	5	1020.4	7.3	5.4	Cs	10	C
Z m	T C		S ‰	Z m	T C		S ‰
0	6.30		32.63	30	6.48		32.54
10	6.40		32.63	45	6.40		32.61
20	6.40		32.63				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	10	07:30	52	4	8	3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction.	Force		Dry	Wet	Type	Amount	
NW	3	1021.5	7.8	6.3	As	10	C

Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiC ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	C	‰	%	μg-at/L	μg-at/L	μg-at/L	m	C	‰	%	μg-at/L	μg-at/L	μg-at/L
0	6.25	32.61	6.80	0.35	0.03	2.90	30	6.35	32.61	6.05	0.36	0.15	4.36
10	6.32	32.59	6.25	0.41	0.09	4.36	50	6.30	32.63	7.10	0.24	0.02	4.36
20	-	32.65	6.90	0.33	0.10	3.27							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	10	09:10	58	4	8	3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1022.5	7.8	5.8	As	8	C
Z m	T C		S ‰	Z m	T C		S ‰
0	6.20		32.41	30	6.37		32.61
10	6.24		32.43	50	6.30		32.61
20	6.36		32.43				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
07	10	10:40	68	3	10	3	2						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW	3	1022.2	8.4	6.4	As	9	C						
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	6.52	32.59	7.00	0.18	0.04	2.90	30	6.52	32.59	7.35	0.12	0.06	1.09
10	6.52	32.59	6.90	0.05	0.03	1.82	50	6.54	32.63	6.95	0.11	0.02	1.45
20	6.60	32.63	6.80	0.15	0.02	2.54	60	6.60	32.65	6.90	0.11	0.06	1.09

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	10	12:25	76	3	10.5	3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1022.5	10.1	8.0	Cs	7	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	6.60		32.57	30	6.65		32.66
10	6.58		32.74	50	6.62		32.72
20	6.60		32.65	70	6.68		32.72

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
09	10	13:55	84	3	10	3	3						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW	3	1022.3	8.6	7.0	As	10	C						
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	7.05	32.72	7.20	0.11	0.10	2.54	30	7.15	32.74	6.61	0.33	0.09	1.45
10	7.05	32.72	6.95	0.20	0.11	2.54	50	7.04	32.74	6.60	0.23	0.10	1.45
20	7.16	32.74	6.90	0.20	0.09	1.45	80	7.13	32.74	6.75	0.21	0.10	-

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	10	15:40	81	3	9	3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1022.0	11.1	8.8	As	10	C
Z m	T C		S ‰		Z m	T C	S ‰
0	7.13		32.54		30	7.21	32.54
10	7.18		32.54		50	7.18	32.50
20	7.15		32.54		75	7.15	32.54

4 월 (April)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	10	07:00	20	4	2.9	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1026.6	12.1	10.6			B
Z m	T C		S ‰		Z m	T C	S ‰
0	5.99		32.18		18	5.22	32.14
10	5.24		32.14				

St. No.	Date	Time	Depth	Water Color	Water Trans.	Wave	Swell
02	10	08:35	28	4		2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1026.5	13.0	11.1	C1	1	B
Z m	T C		S ‰		Z m	T C	S ‰
0	6.38		32.29		20	6.03	32.30
10	6.17		32.27		25	5.83	32.27

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	10	10:25	49	4	4	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1026.5	14.1	11.6			B
Z m	T C		S ‰		Z m	T C	S ‰
0	5.77		32.20		30	5.05	32.18
10	5.61		32.20		45	5.04	32.20
20	5.04		32.20				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	10	11:55	48	4	4	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1026.0	13.4	10.1			B
Z m	T C		S ‰		Z m	T C	S ‰
0	5.90		32.18		30	5.30	32.12
10	5.54		32.14		45	5.24	32.30
20	5.27		32.12				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	10	13:20	52	4	4	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1025.5	12.6	11.2			B
Z m	T C		S ‰		Z m	T C	S ‰
0	6.52		32.27		30	5.95	32.48
10	6.18		32.34		50	5.97	32.50
20	6.01		32.38				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	10	14:55	58	3	5	3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	3	1025.5	14.0	11.6	Cl	2	B
Z m	T C		S ‰	Z m	T C		S ‰
0	6.89		32.39	30	6.27		32.57
10	6.48		32.43	55	6.17		32.57
20	6.38		32.54				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	10	16:20	68	3	5	3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	3	1024.0	13.6	10.7	Cl	2	B
Z m	T C		S ‰	Z m	T C		S ‰
0	7.12		32.52	30	6.43		32.56
10	6.92		32.52	50	6.20		32.59
20	6.85		32.50	65	6.20		32.61

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	10	17:55	74	3	5	3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	3	1023.5	13.4	11.2	Cl	2	B
Z m	T C		S ‰	Z m	T C		S ‰
0	7.20		32.61	30	6.74		32.61
10	6.88		32.63	50	6.42		32.66
20	6.70		32.61	70	6.47		32.66

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	10	19:20	84			3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	3	1022.6	12.9	10.4	Cc	2	B
Z m	T C		S ‰	Z m	T C		S ‰
0	7.40		32.65	30	6.90		32.70
10	7.25		32.63	50	6.69		32.74
20	7.00		32.66	80	6.20		32.74

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	10	20:50	81			3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	3	1022.5	13.2	11.5	Cc	2	B
Z m	T C		S ‰	Z m	T C		S ‰
0	7.77		32.74	30	7.34		32.79
10	7.67		32.81	50	7.22		32.79
20	7.25		32.77	75	7.21		32.81

6 월 (June)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	7	17:40	20	6	5	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	999.5	21.3	20.8		10	G
Z m	T C		S ‰	Z m	T C		S ‰
0	14.18		32.45	18	13.55		32.45
10	13.80		32.45				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	7	19:05	28	6	6	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1000.0	22.6	20.3	Ns	10	C
Z m	T C	S ‰		Z m	T C	S ‰	
0	15.10	32.24		20	12.77	32.50	
10	12.83	32.50		26	12.04	32.59	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	7	20:30	49			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1000.0	21.4	19.8	Ns	10	C
Z m	T C	S ‰		Z m	T C	S ‰	
0	12.67	32.54		30	8.92	32.92	
10	11.48	32.61		45	10.90	32.81	
20	10.36	32.74					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	8	07:25	50	3	12	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	2	1001.0	21.4	19.8	As	8	C
Z m	T C	S ‰		Z m	T C	S ‰	
0	16.39	32.90		30	7.15	33.12	
10	14.05	32.90		45	7.50	33.12	
20	9.03	32.99					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	8	08:35	52	3	13	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	2	1001.5	22.4	20.9	Aq	7	BC
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	15.92		32.81	30	7.22	33.01	
10	14.46		32.81	50	7.05	33.01	
20	9.28		32.95				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	8	10:10	58	3	13.5	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	3	1002.5	24.9	21.1	Ac	8	C
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	15.90		32.81	30	11.66	33.06	
10	14.55		32.90	50	7.79	33.13	
20	12.88		32.90				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	8	11:25	68	2	14	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	3	1001.2	24.2	21.4	Ci	4	BC
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	18.37		32.92	30	7.13	33.19	
10	13.66		32.92	50	7.22	33.24	
20	11.12		32.92	65	7.03	33.24	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	8	12:55	76	4	11	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	3	1002.0	24.2	21.9	Cl	4	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	16.78	32.97	30	9.55	33.19		
10	14.14	33.04	50	7.07	33.30		
20	11.85	33.13	70	7.12	33.30		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	8	14:20	84	2	14	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	3	1002.0	26.2	24.4	Cl	2	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	17.55	33.06	30	8.50	33.26		
10	14.45	33.08	50	7.18	33.33		
20	11.74	33.19	80	7.10	33.33		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	8	15:55	81	2	13	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	3	1002.0	26.0	24.9	Cl	2	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	17.40	33.01	30	7.21	33.30		
10	13.78	32.92	50	7.18	33.30		
20	11.40	33.08	75	7.88	33.37		

8월 (August)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
01	13	18:10	23	3	15	1	1						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
SW	2	1013.5	28.7	27.9	ci	4	BC						
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	22.80	32.02	4.90	1.17	0.11	26.14	20	21.40	32.29	5.10	1.36	0.14	30.13
10	21.40	32.21	4.70	1.38	0.11	43.20							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	13	19:50	30			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1014.5	28.2	27.5	Gi	4	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	21.40	32.21	20	20.76	32.30		
10	21.15	32.02	28	20.47	32.32		

St. No.		Date	Time		Depth	Water Color.		Water Trans.		Wave		Swell	
03		13	21:30		52					1		2	
Wind			Baro.		Air Temp.			Cloud				Weather	
Direction	Force	Dry			Wet	Type		Amount					
SW		2	1013.0		28.0	27.5		C1		2		B	
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	21.60	33.21	5.20	1.34	0.02	37.21	30	20.09	33.55	5.90	1.08	0.06	37.39
10	20.90	33.30	4.90	1.07	0.03	40.29	50	18.58	32.72	4.70	1.10	0.06	48.28
20	20.75	33.40	4.70	0.74	0.12	17.42							

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	14	22:40	57			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S W	2	1013.0	27.6	26.0	Ci	2	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	21.45	32.68	30	18.72	32.72		
10	20.31	32.68	55	17.73	32.57		
20	19.80	32.72					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	15	00:15	52			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S W	3	1014.0	27.8	26.5	Ac	6	B C

Z m	T C	S ‰	O ₂ %	PO ₄ -P µg-at/L	NO ₂ -N µg-at/L	SiO ₂ -Si µg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P µg-at/L	NO ₂ -N µg-at/L	SiO ₂ -Si µg-at/L
0	23.42	32.12	4.90	0.86	0.09	44.01	30	19.62	32.74	5.15	0.81	0.51	19.60
10	22.48	32.21	4.80	0.95	0.14	13.79	50	17.38	32.39	5.20	0.86	0.14	30.86
20	20.48	32.45	5.20	1.05	0.14	-							

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	15	02:00	53			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S W	3	1014.0	27.6	26.8	Ac	6	B C
Z m	T C	S ‰	Z m	T C	S ‰		
0	23.68	32.07	30	16.08	32.76		
10	21.62	32.07	50	15.92	32.81		
20	19.00	32.56					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
07	15	03:35	68			1	2						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
SW	3	1014.0	27.4	26.8	Ac	4	BC						
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	23.81	31.92	6.50	0.87	0.30	9.80	30	16.10	32.76	5.50	1.08	0.03	10.89
10	23.69	31.87	4.90	0.86	0.09	11.25	50	15.89	32.79	5.00	1.02	0.34	12.71
20	18.98	32.54	5.50	0.95	0.06	11.25	65	15.79	32.79	4.90	1.04	0.41	11.25

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	15	05:20	68			2	2
Wind			Air Temp.		Cloud		Weather
Direction	Force	Baro.	Dry	Wet	Type	Amount	
S W	3	1014.0	27.4	26.8	A c	7	B C
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	23.50	31.56	30	14.91	32.70		
10	21.92	31.92	50	13.65	32.57		
20	17.48	32.63	64	13.12	32.56		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
09	15	06:55	84	3	10	1	2						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
SW	3	1014.0	27.2	26.8	Ac	7	BC						
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	23.48	31.47	5.00	0.86	0.26	14.16	30	15.75	32.63	5.60	1.05	0.02	7.99
10	21.05	31.49	5.35	1.20	0.15	10.16	50	11.50	32.39	5.30	1.08	0.17	11.25
20	17.08	32.39	5.80	1.01	0.26	9.80	80	11.40	32.39	5.25	1.53	0.26	11.62

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	15	08:40	81	3	12	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S W	2	1013.0	26.9	26.1	Ns	8	C
Z m	T C	S %	Z m	T C	S %		
0	22.90	31.40	30	16.90	32.43		
10	21.80	31.80	50	11.71	32.16		
20	21.13	31.53	75	9.98	32.29		

10월 (October)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	9	15:05	21	5	2.5	1	1
Wind		Baro.	Air Temp.		Cloud		Weather.
Direction	Force		Dry	Wet	Type	Amount	
S	2	1022.0	25.0	24.8			B
Z m	T C	S %	Z m	T C	S %		
0	19.40	32.77	18	19.52	32.86		
10	19.45	32.83					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	9	16:45	31	4	8.2	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1022.2	20.2	19.2			B
Z m	T C	S %	Z m	T C	S %		
0	23.37	32.77	20	19.55	32.79		
10	19.92	32.81	27	19.63	32.83		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	9	18:35	52	3	13	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	1	1022.3	26.4	25.8			B
Z m	T C		S ‰	Z m	T C		S ‰
0	19.89		32.68	30	19.68		32.33
10	19.90		32.77	50	19.40		32.86
20	19.62		32.81				

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	9	20:15	48	3	15	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1021.4	21.2	20.3			B
Z m	T C		S ‰	Z m	T C		S ‰
0	19.85		32.61	30	18.28		32.99
10	19.72		32.59	45	17.95		33.22
20	19.38		32.59				

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	16	13:20	51	3	16	4	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	4	1020.0	24.5	19.5	Ns	8	C
Z m	T C		S ‰	Z m	T C		S ‰
0	18.80		32.61	30	18.79		32.61
10	18.85		32.59	45	15.45		33.12
20	18.80		32.83				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	17	09:30	56	3	17	2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	3	1022.0	20.9	17.5	Ns	7	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	18.14	32.50	30	17.60	32.74		
10	18.19	32.45	50	16.20	33.31		
20	18.15	32.43					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	17	11:15	70	2	15.4	2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	3	1022.5	21.4	18.4	Ns	8	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	18.25	32.50	30	18.12	32.34		
10	18.02	32.36	50	17.70	32.32		
20	18.09	32.30	65	17.40	32.32		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	17	13:06	75	3	16.5	2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	3	1022.5	21.4	18.9	Ns	8	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	18.42	32.18	30	19.19	32.47		
10	18.45	32.18	50	12.09	33.01		
20	18.44	32.12	70	11.80	33.24		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	17	14:45	83	3	15.2	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	3	1023.1	25.5	24.0	Ns	8	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	18.75	32.63	30	19.20	32.95		
10	18.80	32.61	50	19.21	33.04		
20	19.35	32.79	80	8.71	33.01		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	17	16:25	80	4	16	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1023.5	22.4	22.3	Ac	1	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	19.04	32.70	30	19.26	32.99		
10	19.13	32.65	50	15.89	33.01		
20	19.17	32.79	75	8.48	33.03		

309 선 해 양 관 측 성 적

OCEANOGRAPHIC DATA, LINE 309

2월 (February)

조사선 한라산 (Han Ra San)

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
01	11	09:45	29	7	1.5	3	3						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW	3	1022.5	7.0	5.2	Ci	2	B						
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	6.7	32.54	6.7	0.48	0.13	4.72	20	5.7	32.54	6.8	0.42	0.10	6.53
10	5.7	32.54	6.9	0.48	0.02	5.08	25	6.0	32.61	6.8	0.60	0.11	6.53

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	11	08:05	45	7	2	3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1022.0	7.4	5.2	Ci	2	B
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	6.10	32.48	30	6.38	32.66		
10	6.33	32.43	40	6.36	32.54		
20	6.42	32.47					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
03	11	06:25	54			3	2						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW	3	1022.0	7.6	5.5	Ci	2	B						
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L
0	6.25	32.47	6.70	0.39	0.07	5.81	30	6.51	32.54	6.63	0.51	0.18	3.99
10	6.48	32.47	6.70	0.54	0.13	4.72	50	6.53	32.53	6.70	0.54	0.10	5.45
20	6.56	32.54	6.65	0.42	0.03	6.17							

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	11	05:00	57			3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1022.0	7.9	6.2	As	6	BC
Z m	T C		S ‰		Z m	T C	S ‰
0	7.00		32.61		30	7.02	32.70
10	7.09		32.61		55	7.16	32.72
20	7.14		32.61				

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
05	11	03:20	69			3	3						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW	4	1022.0	7.2	5.8	As	6	BC						
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	C	‰	%	μg-at/L	μg-at/L	μg-at/L	m	C	‰	%	μg-at/L	μg-at/L	μg-at/L
0	7.33	32.52	6.70	0.48	0.11	1.45	30	7.30	32.61	6.30	0.47	0.10	2.54
10	7.30	32.61	6.30	0.48	0.03	2.90	50	7.30	32.61	6.40	0.44	0.17	4.36
20	7.44	32.61	5.80	0.47	0.09	4.72	65	7.29	32.61	6.40	0.54	0.09	2.90

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	11	01:50	64			3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1021.5	8.2	7.0	Sc	6	BC
Z m	T C		S ‰		Z m	T C	S ‰
0	7.07		32.54		30	7.43	32.54
10	7.35		32.54		50	7.47	32.57
20	7.48		32.54		60	7.52	32.61

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
07	11	00:05	66			3	3						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW	3	1021.0	8.1	6.5	Sc	7	BC						
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	7.25	32.56	6.50	0.48	0	5.45	30	7.60	32.65	6.30	0.48	0.14	6.53
10	7.44	32.59	6.60	0.35	0	6.18	50	7.60	32.65	6.00	0.54	0.02	5.81
20	7.50	32.59	6.50	0.51	0.02	3.99	65	7.60	32.54	6.25	0.51	0.06	6.17

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	10	22:35	82			3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1021.5	8.2	6.6	Sc	3	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	7.72	32.43	30	7.80	32.56		
10	7.75	32.43	50	7.82	32.56		
20	7.84	32.56	80	7.88	32.56		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
09	10	20:50	82			3	3						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW	3	1022.0	9.6	8.2	Cc	6	BC						
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	8.07	32.41	7.20	0.11	0.10	2.54	30	7.86	32.54	6.61	0.33	0.09	1.45
10	7.98	32.54	6.95	0.20	0.11	2.54	50	7.69	32.54	6.60	0.23	0.10	1.45
20	7.84	32.54	6.90	0.20	0.09	1.45	80	7.62	32.54	6.75	0.21	0.10	-

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	10	19:20	88			3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1021.5	9.5	8.2	Cc	7	BC
Z		T	S	Z	T	S	
m		C	‰	m	C	‰	
0		8.50	32.54	50	8.02	32.68	
10		8.10	32.54	75	8.01	32.68	
20		8.09	32.65	85	8.02	32.68	
30		8.13	32.68				

4월 (April)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	11	13:25	25	5	2	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1023.5	14.5	12.0	As	6	BC
Z m		T C	S ‰	Z m		T C	S ‰
0		7.49	31.40	20		6.28	31.89
10		7.38	31.40	24		6.12	32.11

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	11	11:55	42	5	2.5	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1023.0	14.2	12.8	As	6	BC
Z m		T C	S ‰	Z m		T C	S ‰
0		7.25	31.96	30		6.10	32.27
10		7.18	32.03	40		6.11	32.27
20		6.13	32.23				

St. No	Date	Time	Depth	Water Color	Water Trans.	Wave	Swell
03	11	10:30	50	4	2.8	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1022.8	14.0	12.9	AS	6	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	6.50		32.39	30	5.88		32.39
10	6.48		32.30	45	5.88		32.39
20	6.35		32.30				

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	11	09:05	57	4	3.2	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1023.5	13.2	11.9	As	6	BC
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	6.71	32.43	30	5.92	32.43		
10	6.58	32.43	55	5.92	32.43		
20	5.91	32.43					

St. No	Date	Time	Depth	Water Color	Water Trans.	Wave	Swell
05	11	07:35	69	4	3.8	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1023.5	10.7	10.2	AS	6	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	6.90	32.48	30	6.17	32.52		
10	6.61	32.52	50	6.18	32.50		
20	6.23	32.52	65	6.10	32.50		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	11	06:10	64			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1022.5	11.5	10.4	Cc	1	B
S m	T C		S ‰	Z m	T C		S ‰
0	6.90		32.54	30	6.34		32.52
10	6.88		32.54	50	6.34		32.59
20	6.57		32.56	60	6.49		32.61

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	11	04:45	66			3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	3	1022.5	11.0	10.4	Gi	1	B
Z m	T C		S ‰	Z m	T C		S ‰
0	7.31		32.54	30	6.57		32.61
10	7.09		32.00	50	7.34		32.54
20	6.90		32.57	60	6.49		32.63

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	11	03:20	92			3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	2	1022.0	10.2	9.7	Gi	1	B
Z m	T C		S ‰	Z m	T C		S ‰
0	7.29		32.72	30	6.74		32.72
10	7.10		32.72	50	6.78		32.79
20	6.92		32.72	80	6.87		32.79

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	11	01:40	82			2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	3	1022.5	11.2	10.8	Cc	1	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	7.65	32.74	30	7.12	32.74		
10	7.42	32.74	50	7.12	32.74		
20	7.10	32.74	80	7.25	32.83		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	11	00:15	84			2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	3	1022.5	11.5	10.2	Cc	1	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	7.60	32.83	50	7.50	32.85		
10	7.52	32.93	60	7.45	32.94		
20	7.61	32.93	80	7.40	32.94		
30	7.49	32.83					

6월 (June)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	7	13:45	29	6	5	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1000.0	26.8	22.9	As	10	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	15.20	32.50	20	12.40	32.57		
10	13.73	32.56	27	10.30	32.94		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	7	12:10	45	6	6	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1002.0	26.2	22.8	As	10	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	16.95	32.70	30	9.05	32.42		
10	14.75	32.77	40	8.70	33.04		
20	9.58	32.85					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	7	10:30	54	5	8	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1002.5	20.8	19.0	Ns	10	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	16.45	32.92	30	7.65	33.17		
10	14.05	32.90	50	7.62	33.21		
20	7.83	33.12					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	7	09:05	57	4	10	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	3	1002.5	20.3	18.6	Ns	10	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	17.40	32.83	30	7.50	33.21		
10	13.82	32.83	50	7.37	33.21		
20	9.15	33.10					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	7	07:30	69	4	10	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	3	1003.0	20.5	19.8	Ns	10	C
Z m	T C		S ‰	Z m	T C		S ‰
0	16.20		32.76	30	7.91		33.22
10	15.70		32.79	50	7.93		33.28
20	10.80		33.10	65	7.47		33.31

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	7	06:25	64			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	2	1002.5	19.6	18.9	Ns	10	C
Z m	T C		S ‰	Z m	T C		S ‰
0	16.65		32.92	30	7.54		33.26
10	14.48		32.94	50	7.42		33.28
20	11.62		32.92	60	7.32		33.31

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	7	04:25	66			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1005.5	20.6	19.8	Ns	10	C
Z m	T C		S ‰	Z m	T C		S ‰
0	16.84		32.97	30	8.77		33.17
10	14.85		32.99	50	7.34		33.26
20	12.97		33.03	60	7.42		33.31

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	7	03:00	82			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1005.5	20.7	20.2	As	7	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	18.70		33.15	30	10.05		33.24
10	14.42		33.04	50	-		33.13
20	12.30		33.13	80	7.60		33.37

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	7	01:25	82			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1001.5	20.9	20.4	As	6	BC
Z m	T C		S ‰	Z m	T C		S ‰
-	18.15		33.24	30	10.42		33.28
10	14.90		33.04	50	7.74		33.40
20	14.13		33.17	80	7.90		33.62

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	6	24:00	88			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1008.0	21.4	20.8	As	6	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	19.00		33.08	50	7.90		33.22
10	14.83		33.12	75	7.90		33.42
20	12.24		33.24	85	7.91		33.60
30	9.75		33.31				

8월 (August)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
01	13	13:35	32	3	16	1	2						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
SW	2	1014.0	31.8	30.9	CC	2	B						
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	23.20	32.41	4.80	1.26	0.42	16.70	20	21.72	32.43	4.90	1.05	0.06	11.62
10	23.15	32.30	4.80	1.23	0.05	17.42	30	20.32	32.50	4.90	1.47	0.03	13.79

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	13	12:00	45	3	17	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2		1014.0	30.3	29.0	Cc	
B							
Z m	T °C		S ‰	Z m	T °C		S ‰
0	22.92		32.32	30	18.87		32.74
10	22.09		32.32	40	18.07		32.74
20	21.20		32.61				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	13	10:15	54	3	15	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1014.0	28.5	27.2	Cc	2	B

Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	22.81	32.39	8.50	1.17	0.05	31.58	30	17.39	32.81	5.10	1.52	0.03	28.31
10	22.11	32.56	4.80	0.86	0.02	41.38	50	17.32	32.81	4.90	1.17	0.10	44.29
20	19.71	32.74	6.40	1.34	0.03	33.40							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	13	08:40	57	3	12	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1013.0	27.9	26.8	Ac	2	B
Z m	T °C		S ‰	Z m		T °C	S ‰
0	22.61		32.41	30		16.85	32.88
10	22.12		32.76	50		15.51	32.25
20	18.05		32.88				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
05	13	06:55	62	3	12	1	2						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
E	2	1012.0	26.2	25.0	Ac	2	B						
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	22.61	32.18	6.90	1.62	0.26	23.23	30	18.60	32.76	5.00	1.34	0.13	17.79
10	21.98	32.21	4.70	1.44	0.02	11.62	50	14.38	32.76	5.40	1.68	0.20	45.38
20	21.90	32.65	5.30	1.27	0.04	39.93	60	13.68	32.41	4.90	1.61	0.13	35.94

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	13	05:20	66			1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1012.0	26.0	25.0	Cc	2	B
Z m	T °C		S ‰	Z m		T °C	S ‰
0	22.49		31.80	30		17.20	32.68
10	22.00		31.80	50		13.61	32.16
20	18.78		32.65	64		13.18	32.65

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
07	13	03:35	68			1	2						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
SW	2	1012.0	26.4	24.8	Cc	4	BG						
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	22.58	31.44	4.90	1.31	0.05	11.62	30	16.70	32.56	5.40	1.23	0.02	10.16
10	22.24	31.47	-	0.83	0.06	13.79	50	12.90	32.88	5.35	1.55	0.08	40.66
20	17.12	32.00	4.90	0.72	0.06	13.43	65	12.65	32.88	4.90	1.50	0.10	43.92

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	13	02:00	85			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1011.5	26.8	25.4	Cc	4	BC
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	23.10	31.69	30	18.18	31.71		
10	22.75	31.67	50	16.82	32.65		
20	21.20	31.62	80	10.63	32.59		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	13	00:15	83			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1010.0	26.2	24.8	As	6	BC

Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	%	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	%	μg-at/L	μg-at/L	μg-at/L
0	22.97	31.56	4.80	1.16	0.02	18.15	30	13.22	32.63	5.30	1.44	0.04	15.61
10	20.76	31.73	5.20	1.08	0.03	10.16	50	8.94	32.41	5.20	1.68	0.12	13.79
20	16.51	32.39	5.60	1.34	0.02	10.16	80	6.55	31.74	5.15	1.17	1.66	22.86

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	12	22:40	84			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1010.0	27.0	25.1	As	8	C
Z m	T °C		S ‰	Z m	T °C		S ‰
0	24.10		31.37	50	13.25		32.20
10	23.14		31.24	75	8.10		32.34
20	17.19		31.94	80	7.78		32.34
30	14.80		32.12				

10월 (October)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	18	11:30	34	4	6.8	3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1022.5	23.2	21.0			
Z m	T °C		S ‰	Z m	T °C		S ‰
0	18.95		32.79	20	18.99		32.83
10	19.03		32.85	30	19.04		32.70

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	18	09:40	44	4		3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1022.2	22.8	19.2			
Z m	T °C		S ‰	Z m	T °C		S ‰
0	19.00		32.81	30	18.80		32.95
10	18.92		32.88	40	18.80		32.88
20	18.98		32.86				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	18	07:55	53	4	5.2	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1022.0	21.0	19.2			
Z m	T C		S ‰	Z m	T C		S ‰
0	18.82		32.83	30	18.82		32.83
10	18.82		32.88	50	18.82		32.86
20	18.82		32.85				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	18	06:10	56			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1022.5	20.9	18.8			
Z m	T C		S ‰	Z m	T C		S ‰
0	18.82		32.66	30	18.62		32.95
10	18.82		32.83	50	18.32		33.03
20	18.82		32.86				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	18	04:25	68			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1022.5	21.0	18.9			B
Z m	T C		S ‰	Z m	T C		S ‰
0	18.23		32.54	30	18.10		33.10
10	18.28		32.94	50	16.68		33.22
20	18.52		32.72	65	16.67		33.19

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	18	02:45	63			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1022.0	20.6	19.2			B
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	18.72		32.85	30	18.62	32.99	
10	18.72		32.84	50	16.44	33.24	
20	18.72		32.94	60	14.38	33.42	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	18	01:00	65			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1019.0	21.2	18.9			B
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	18.80		32.57	30	18.81	32.50	
10	18.80		32.52	50	13.61	33.26	
20	18.80		32.52	60	12.98	33.28	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	17	23:15	81			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1017.0	20.5	18.9			B
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	19.25		32.83	30	19.40	33.04	
10	19.40		32.68	50	17.10	33.12	
20	19.40		32.76	75	10.99	32.81	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	17	21:30	81			2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	3	1021.5	22.5	20.8			B
Z m	T C	S ‰	Z m	T C	S ‰		
0	19.21	32.97	30	17.83	33.19		
10	19.12	33.01	50	10.16	33.08		
20	19.15	33.01	75	9.67	33.17		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	17	20:10	87			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1022.5	24.2	21.9	Ac	3	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	19.40	32.90	50	18.15	32.94		
10	19.12	32.85	75	16.90	33.01		
20	19.12	32.92	85	16.41	33.17		
30	19.12	32.90					

310 선 해 양 관 측 성 적

OCEANOGRAPHIC DATA, LINE 310

2월(February)

조사선 한라산(Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	12	08:10	27	6	4	2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1026.0	8.3	7.7	Ns	10	R
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	
0	6.35	33.21	-	0.60	0.06	4.36	
10	6.32	33.28	-	0.36	0.09	4.36	
20	6.32	32.54	-	0.08	0.11	4.72	
25	6.32	32.54	-	0.15	0.15	3.99	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	12	09:45	58	5	7	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1026.0	9.9	9.0	Ns	10	R
Z m	T C	S ‰	Z m	T C	S ‰		
0	7.55	32.29	30	-	32.83		
10	7.53	32.79	55	7.48	32.83		
20	7.48	32.79					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	12	11:20	71	4	8.5	3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1030.0	9.6	8.6	Ns	10	R

Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	7.60	32.47	6.90	0.27	0.03	2.90	30	7.62	32.52	7.40	-	0.03	3.99
10	7.62	32.50	7.35	0.35	0.03	4.36	50	7.70	32.52	6.80	0.29	0.02	2.54
20	7.62	32.52	6.40	0.24	0.09	2.90		7.62	32.50	6.80	0.27	0.02	2.54

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	12	13:00	72	3	10	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	3	1030.0	11.3	10.6	Ns	10	R
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	7.50	32.47	30	7.45	32.48		
10	7.54	32.47	50	7.46	32.48		
20	7.45	32.48	70	7.48	32.52		

St. No.		Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell					
07		12	14:25	82	3	11.5	2	2					
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
SE		3	1030.0	9.3	8.8	ns	10	C					
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	%	µg-at/L	µg-at/L	µg-at/L	m	°C	‰	%	µg-at/L	µg-at/L	µg-at/L
0	7.62	32.50	6.92	0.20	0.09	2.54	30	7.58	32.83	6.88	0.42	0.05	5.08
10	7.50	32.54	6.97	0.50	0.02	2.54	50	7.55	32.33	6.82	0.39	0.05	2.90
20	7.51	32.52	6.51	0.38	0.05	5.81	80	7.53	32.83	6.87	0.35	0.03	5.08

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	12	16:05	87	3	9	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2		1026.0	9.5	8.8	Ns	
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	7.20	32.85	50	7.67	32.85		
10	7.79	32.94	75	7.66	32.88		
20	7.78	32.88	85	7.65	32.92		
30	7.78	32.88					

St. No.		Date	Time		Depth		Water Color.		Water Trans.		Wave		Swell	
09		12	17:30		92		3		11		1		1	
Wind			Air Temp.					Cloud				Weather		
Direction		Force	Baro.		Dry		Wet		Type		Amount			
SW		1	1026.5		9.7		8.5		Ns		10		C	
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	
m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L	
0	9.10	32.90	6.60	0.36	0.10	5.08	50	8.48	32.90	6.90	0.42	0.02	9.44	
10	8.45	32.90	6.80	0.39	0.06	4.72	75	8.46	32.90	7.0	0.33	0.02	5.08	
20	8.42	32.90	6.60	0.35	0.07	6.45	90	8.35	32.90	7.95	0.48	0.02	6.17	
30	8.40	32.90	7.10	0.29	0.06	6.53								

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	12	19:10	90			1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	1	1026.0	9.5	8.4	Ns	10	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	9.10	32.90	50	8.57	32.88		
10	8.60	32.90	75	8.58	32.88		
20	8.60	32.88	85	8.57	33.01		
30	8.55	32.88					

4 월, (April)

조사선 한라산(Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	12	08:30	27	5	3.2	2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1028.5	12.2	10.7			B
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	6.09	32.30	20	5.99	32.36		
10	5.97	32.36	25	5.49	32.36		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	12	10:00	54	5	3	1	.3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1028.5	13.4	11.9			B
Z m	T °C		S ‰		Z m	T °C	S ‰
0	6.47		32.39		30	6.36	32.43
10	6.48		32.39		50	6.33	32.43
20	6.37		32.39				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	12	11:35	71	4	5	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1008.5	14.0	12.2			B
Z m	T °C		S ‰		Z m	T °C	S ‰
0	7.25		32.48		30	6.26	32.57
10	6.88		32.48		50	6.36	32.57
20	6.30		32.54		65	6.34	32.57

St. No.	Date	Time	Depth	Water Color	Water Trans.	Wave	Swell
06	12	13:15	72	3	5-8	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1029.0	16.5	15.2			B
Z m	T °C		S ‰		Z m	T °C	S ‰
0	7.12		32.57		30	6.65	32.57
10	7.09		32.57		50	6.88	32.63
20	6.98		32.57		70	6.29	32.63

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	12	14:45	79	4	6	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1028.5	16.9	15.8			B
Z m	T C	S ‰	Z m	T C	S ‰		
0	8.62	32.65	30	7.08	32.54		
10	7.44	32.66	50	6.16	32.54		
20	7.26	32.66	75	6.16	32.54		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	12	16:25	87	4	6	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1028.5	17.8	16.0			B
Z m	T C	S ‰	Z m	T C	S ‰		
0	8.70	32.68	50	7.07	32.90		
10	7.74	32.74	75	7.08	32.90		
20	7.33	32.74	85	7.07	32.90		
30	7.10	32.83					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	12	17:50	92	4	5.5	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1028.5	17.1	16.2			B
Z m	T C	S ‰	Z m	T C	S ‰		
0	8.65	32.85	50	7.07	32.90		
10	7.67	32.83	75	7.64	33.06		
20	7.49	32.83	90	7.75	33.13		
30	7.02	32.83					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	12	19:35	90			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1026.5	15.9	14.1			B
Z m	T C		S ‰	Z m	T C		S ‰
0	8.76		32.72	50	7.69		33.12
10	8.27		32.92	75	7.81		33.24
20	7.85		32.92	87	7.99		33.31
30	7.67		33.03				

6월 (June)

조사선 한라산(Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	6	10:20	27	6	5	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1011.0	23.2	20.1	As	6	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	17.00		33.19	20	8.70		33.30
10	14.16		33.55				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	6	11:55	58	3	13	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1011.0	23.5	20.8	As	6	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	17.14		33.17	30	8.50		33.39
10	15.95		33.17	50	8.20		33.39
20	11.91		33.53				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	6	13:30	71	2	16	2	1
Wind		Baro.	Air Temp.		Cloud		Weather.
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1010.5	24.0	21.2	As	4	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	17.40	33.01	30	8.12	33.42		
10	15.72	33.78	50	7.95	33.42		
20	11.41	33.55	65	7.82	33.42		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	6	15:05	72	2	16	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1010.0	24.0	20.8	As	4	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	18.05	33.12	30	7.98	33.48		
10	15.62	33.26	50	7.62	33.42		
20	11.60	33.75	70	7.53	33.42		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	6	16:30	82	2	14	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1009.5	23.4	22.0	As	8	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	17.60	33.19	30	8.72	33.53		
10	15.72	33.10	50	8.50	33.62		
20	12.46	33.06	80	7.72	33.62		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	6	18:05	87	2	15	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1009.5	23.2	21.4	C1	8	C
Z m	T C		S ‰	Z m	T C		S ‰
0	18.60		33.13	50	10.57		33.28
10	14.67		33.13	75	10.98		33.48
20	16.10		33.26	85	7.68		33.59
30	10.20		33.53				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	6	19:30	92	2	15	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1009.0	23.5	21.4	C1	8	C
Z m	T C		S ‰	Z m	T C		S ‰
0	18.80		33.35	50	7.87		33.37
10	15.65		33.22	75	8.00		33.42
20	15.00		33.22	90	8.04		33.62
30	9.52		33.31				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	6	21:05	90			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1008.5	22.0	21.5	As	8	C
Z m	T C		S ‰	Z m	T C		S ‰
0	18.80		33.26	50	9.70		33.22
10	14.85		33.13	75	9.01		33.37
20	11.69		33.30	85	8.08		33.59
30	9.24		33.37				

8월(August)

조사선 한라산(Han Ra San)

St. No.		Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell					
03		12	07:00	34	4	5	1	2					
Wind		Baro.	Air Temp.		Cloud		Weather.						
Direction	Force		Dry	Wet	Type	Amount							
NW	2	1010.5	29.8	27.2	Cl	7	BC						
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	24.41	32.25	4.80	0.96	0.02	11.25	20	21.12	32.57	4.90	0.86	0.02	17.06
10	24.30	32.18	4.50	1.19	0.02	11.62	30	18.18	32.72	4.90	1.07	0.12	12.71

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	12	08:40	55	3	24	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1010.5	28.9	27.2	C1	7	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	24.42		32.16	30	17.60		33.03
10	23.30		32.27	50	12.92		33.24
20	21.28		32.63				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
05	12	10:15	73	3	24	1	2						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW	2	1010.5	28.0	25.7	As	8	C						
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	24.60	32.18	4.72	0.87	0.07	16.70	30	18.84	32.90	5.30	1.32	0.10	15.61
10	24.34	32.16	4.70	0.96	0.02	12.71	50	12.50	33.10	-	0.81	0.10	15.25
20	24.10	32.16	4.80	1.34	0.02	17.42	70	11.52	33.11	4.70	0.96	0.19	15.25

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	12	11:15	74	3	23	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1010.0	27.9	25.1	As	8	C
Z	T		S	Z	T	S	
m	C		‰	m	C	‰	
0	24.55		32.03	30	22.45	32.94	
10	24.38		32.07	50	10.31	32.92	
20	24.12		32.35	70	9.70	32.11	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
07	12	13:30	79	3	13	1	2						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
SW	3	1010.0	28.0	26.5	As	8	C						
Z m	T C	S ‰	O ₂ %	PO ₄ -P µg-at/L	NO ₂ -N µg-at/L	SiO ₂ -Si µg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P µg-at/L	NO ₂ -N µg-at/L	SiO ₂ -Si µg-at/L
0	24.50	32.02	4.70	0.87	0.03	10.16	30	16.80	33.12	5.45	1.58	0.02	9.80
10	24.38	-	4.50	0.87	0.02	9.44	50	12.75	33.19	5.20	0.87	0.02	15.25
20	20.30	32.47	5.30	1.17	0.22	13.43	75	9.90	32.88	4.90	0.81	1.48	18.88

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell	
08	12	15:10	85	3	13.5	1	2	
Wind		Baro.	Air Temp.		Cloud		Weather	
Direction	Force		Dry	Wet	Type	Amount		
SW	3	1010.0	28.7	25.9	As	8	C	
Z m	T C		S ‰		Z m	T C		S ‰
0	24.20		32.02		50	12.60		33.26
10	23.22		31.96		75	10.22		33.10
20	22.54		31.96		80	9.57		32.79
30	21.51		32.14					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
09	12	16:45	94	3	17	1	2						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
SW	2	1010.5	27.9	26.1	ci	8	C						
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	24.50	32.20	4.70	0.93	0.22	17.42	50	14.71	33.17	-	1.10	0.14	15.97
10	23.37	32.14	4.80	0.84	0.04	13.79	75	10.88	32.81	5.90	1.16	0.04	11.98
20	23.52	32.14	4.60	1.10	0.46	23.23	90	9.12	32.76	4.70	1.23	1.38	31.58
30	22.30	32.57	-	1.50	0.06	9.80							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	12	18:30	93	3	22	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1010.5	27.8	26.1	ci	7	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	24.50	32.21	30	16.28	32.92		
10	23.51	32.21	50	9.60	32.74		
20	22.30	32.20	75	8.98	32.70		

10 월(October)

조사선 한라산(Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	18	15:55	25	4	7.5	4	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1022.5	23.2	22.4	Cc	9	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	19.10	32.74	20	18.99	33.01		
10	19.10	32.94	23	18.42	32.92		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	18	17:40	57	3	16.5	4	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1019.0	22.2	21.0	Ns	9	C
Z m	T C		S ‰	Z m	T C		S ‰
0	18.20		32.92	30	17.90		32.95
10	18.75		33.28	55	16.75		33.10
20	18.78		33.13				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	18	19:35	69			3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1019.0	21.0	19.8	Ns	9	C
Z m	T C		S ‰	Z m	T C		S ‰
0	18.80		32.92	30	18.35		33.06
10	18.80		32.88	50	15.00		33.28
20	18.85		32.92	65	14.60		33.42

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	18	21:30	71			3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1019.0	21.0	20.3	Ns	10	R
Z m	T C		S ‰	Z m	T C		S ‰
0	18.92		32.79	30	19.08		32.94
10	18.95		32.76	50	14.48		33.24
20	18.98		32.77	65	12.54		33.37

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	18	22:55	81			2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1019.0	20.5	18.9	Ns	10	R
Z m	T C		S ‰		Z m	T C	S ‰
0	19.00		32.94		30	18.89	33.01
10	18.88		32.86		50	15.35	33.42
20	18.92		32.86		75	11.77	33.43

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	19	00:40	85			2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1019.0	20.0	18.5	Ns	10	R
Z m	T C		S ‰		Z m	T C	S ‰
0	19.00		33.13		50	16.87	33.26
10	18.52		33.13		75	12.93	33.40
20	18.46		33.03		83	10.26	33.40
30	18.26		33.10				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	19	02:15	90			3	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1018.7	19.5	19.0	Ns	10	R
Z m	T C		S ‰		Z m	T C	S ‰
0	19.00		33.04		50	17.24	33.10
10	18.65		32.99		75	11.58	33.10
20	18.49		33.04		85	9.06	33.31
30	18.49		32.94				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	19	04:10	90			3	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1020.0	19.3	19.1	Sc	10	F
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	19.70	33.01	50	14.91	33.31		
10	18.88	32.95	75	10.30	33.37		
20	18.62	32.99	85	9.30	33.30		
30	18.03	32.99					

311 선 해 양 관 측 성 적

OCEANOGRAPHIC DATA, LINE 311

2 월 (February)

조사 선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	13	09:30	34	7	2	4	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1023.0	8.3	6.6	Ns	10	C
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	6.84	32.92	20	7.10	32.86		
10	6.98	32.92	30	7.10	32.92		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
05	13	07:50	75	6	3.5	4	3						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NW	5	1023.5	8.0	6.4	Ns	10	C						
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	7.64	32.97	6.82	0.48	0.06	17.06	30	7.80	32.95	7.42	0.71	0.13	7.26
10	7.83	32.97	6.72	0.53	0.03	16.34	50	7.81	32.95	7.32	0.71	0.06	6.90
20	7.80	32.95	7.22	0.60	0.19	6.90	74	7.80	32.94	7.32	0.54	0.09	6.90

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	13	06:20	90			4	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1023.0	8.1	6.8	Ns	10	C
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	8.10	32.95	50	7.60	32.92		
10	7.64	32.77	75	7.65	32.90		
20	7.64	32.92	85	7.64	32.92		
30	7.62	32.92					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
07	13	04:10	90			3	3						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NE	4	1023.0	8.7	7.0	Ns	10	C						
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	8.50	32.92	7.42	0.63	0.03	6.17	50	8.10	32.92	7.82	0.56	0.02	15.25
10	8.15	32.92	7.42	0.38	0.03	9.44	75	8.10	32.99	7.52	0.65	0.02	15.61
20	8.22	32.92	7.95	0.48	-	7.99	85	8.10	32.99	6.40	0.65	0.02	22.51
30	8.14	32.92	6.82	0.54	0.02	16.34							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	13	02:40	93			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	3	1023.0	8.9	7.0	Ns	10	C
Z m	T C		S ‰	Z m	T C		S ‰
0	8.60		32.92	50	7.42		32.88
10	7.87		32.92	75	7.20		32.85
20	7.76		32.92	90	7.06		32.83
30	7.50		32.92				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
09	13	0100	89			2	2						
Wind		Bare.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
E	3	1023.5	9.0	8.2	NS	10	C						
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	8.70	32.56	7.32	0.18	0.03	4.36	50	8.34	32.92	6.72	0.45	0.02	6.53
10	8.25	32.86	7.12	0.39	0.02	6.53	75	8.32	32.92	7.12	0.42	0.02	6.53
20	8.41	32.92	7.12	0.48	0.03	8.71	85	8.21	32.92	7.22	0.45	0.06	6.53
30	8.37	32.92	6.66	0.45	0.02	6.90							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	10	23:20	84			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1026.0	8.9	7.8	Ns	10	C
Z m	T °C		S ‰	Z m	T °C		S ‰
0	8.85		33.03	30	8.81		33.04
10	8.80		33.03	50	8.88		33.04
20	8.80		33.12	80	8.80		33.35

4 월 (April)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	13	10:25	34	4	4.2	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1026.0	12.7	12.0	As	1	B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	8.60		32.56	20	8.62		33.12
10	8.03		33.10	30	8.42		33.06

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	13	08:40	75	5	2	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1026.5	12.5	11.9	As	1	B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	7.87		32.90	30	7.86		32.90
10	7.83		32.90	50	7.90		32.90
20	7.90		32.90	70	7.88		32.95

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	13	06:25	90			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1026.0	11.8	11.2	As	1	B
Z m	T C		S ‰		Z m	T C	S ‰
0	8.23		32.52		50	7.72	33.13
10	7.95		32.86		75	7.77	33.21
20	7.59		32.90		87	7.90	33.21
30	7.53		33.01				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	13	04:45	90			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1026.0	12.2	11.0	CC	1	B
Z m	T C		S ‰		Z m	T C	S ‰
0	9.02		32.43		50	8.28	33.19
10	8.98		32.66		75	8.16	33.28
20	8.62		32.59		87	8.25	33.35
30	8.30		32.92				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	13	03:10	93			1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1024.5	12.5	11.2	Cc	1	B
Z m	T C		S ‰		Z m	T C	S ‰
0	8.25		32.52		50	7.87	33.13
10	7.89		32.41		75	8.21	33.21
20	7.69		32.50		90	8.33	33.33
30	7.81		33.04				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	13	01:35	89			2	2
Wind		Bara	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1024.5	14.5	13.7	As	1	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	9.76	32.76	50	7.90	33.04		
10	8.79	32.70	75	7.99	33.24		
20	8.30	32.88	95	8.41	33.46		
30	8.01	33.01					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	13	00:50	84			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1025.5	14.8	13.5	Cc	1	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	7.07	32.94	30	8.05	33.28		
10	8.20	32.94	50	9.32	33.77		
20	7.88	33.03	80	9.44	33.78		

6월 (June)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	5	10:15	34	5	7	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1011.0	24.4	23.2	Cc	5	F
Z m	T C	S ‰	Z m	T C	S ‰		
0	16.48	33.78	20	13.25	34.20		
10	14.49	34.11	30	11.55	34.16		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	5	08:35	75	4	9	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1012.0	21.8	20.7	Cl	5	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	15.12	34.02	30	12.72	34.11		
10	13.74	34.11	50	12.60	34.20		
20	12.68	34.18	70	12.52	34.20		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	5	07:05	90	4	9	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	2	1011.0	19.2	18.3			B
Z m	T C	S ‰	Z m	T C	S ‰		
0	16.00	34.33	50	13.13	34.09		
10	14.94	34.33	75	12.71	34.47		
20	13.49	34.42	85	12.36	34.49		
30	13.46	34.43					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	5	05:25	90			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	2	1011.0	18.4	17.9			B
Z m	T C	S ‰	Z m	T C	S ‰		
0	16.50	34.33	50	12.85	34.60		
10	16.30	34.34	75	11.55	34.85		
20	14.42	34.49	85	11.10	34.67		
30	12.78	34.51					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	5	03:56	93			2	1
Wind		Baro.	Air Temp		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1011.5	18.8	18.3	Ci	6	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	17.10	33.69	50	13.04	34.46		
10	15.69	33.82	75	12.19	34.72		
20	14.42	34.02	90	10.58	34.61		
30	14.25	34.43					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	5	02:15	89			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1011.0	18.8	18.3	Cc	3	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	16.80	33.91	50	11.05	34.34		
10	16.45	33.89	75	10.70	34.36		
20	15.49	33.89	85	10.55	34.36		
30	13.83	34.43					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	5	00:45	84			1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1011.0	18.7	18.4	Cc	6	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	16.44	33.35	30	11.23	34.43		
10	15.80	33.64	50	10.72	34.43		
20	12.11	34.43	80	10.72	34.36		

8월 (August)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	12	01:45	35			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1009.0	24.8	25.7	Gi	2	B
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	24.25	32.36	20	20.00	32.63		
10	23.58	32.36	30	19.60	32.79		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
05	12	00:05	74			1	2						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
SW	2	1009.0	27.0	26.2	Gi	2	B						
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	22.18	32.45	4.90	1.14	0.02	12.71	30	21.12	32.56	4.80	1.17	0.03	14.88
10	21.99	32.48	4.90	1.32	0.06	13.78	50	20.87	32.56	4.80	1.07	0.06	14.52
20	21.62	32.48	5.20	1.16	0.06	12.34	70	20.14	32.70	4.90	1.11	0.60	15.25

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swoll
06	11	22:20	90			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1009.0	27.5	26.7	Cc	2	B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	23.90		32.50	50	20.48		32.68
10	21.95		32.70	75	19.54		32.74
20	20.88		32.63	85	18.30		32.83
30	20.40		32.68				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	11	20:35	90			1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1009.0	28.2	27.6	Cc	2	B

Z m	T °C	S ‰	O ₂ ‰	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ ‰	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	23.05	32.43	5.10	1.08	0.03	11.25	50	18.50	32.70	5.00	1.11	0.02	15.25
10	22.90	32.36	-	1.26	0.02	13.27	75	13.95	32.24	5.80	0.99	0.03	23.23
20	22.93	32.43	4.80	1.22	0.06	15.61	87	12.59	33.31	4.90	1.52	0.27	-
30	21.69	32.50	4.90	1.07	0.02	13.79							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	11	19.00	93	3	19	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1009.5	29.1	28.0	CC	2	B
Z m		T °C	S ‰	Z m		T °C	S ‰
0		25.10	32.43	50		20.89	32.95
10		23.58	32.30	75		15.40	33.26
20		23.70	32.34	90		11.50	33.40
30		22.59	32.48				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
09	11	17:15	89	3	23	2	3						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
SW	3	1009.5	26.0	25.1	Cc	2	B						
Z m	T C	S ‰	O ₂ ‰	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ ‰	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	25.00	32.12	4.90	1.01	0.02	10.16	50	11.84	33.21	5.30	1.32	0.03	15.25
10	24.10	32.18	4.60	0.93	-	11.98	75	11.58	33.39	5.40	1.50	0.04	15.25
20	23.70	32.25	4.80	1.47	0.38	-	85	11.30	33.39	5.40	1.53	0.66	18.88
30	20.71	32.57	5.10	0.84	0.02	12.71							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	11	15:40	84	3	21	2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1007.0	28.4	25.9	Cc	2	B
Z m	T °C		S ‰		Z m	T °C	S ‰
0	24.85		32.03		50	11.29	33.39
10	24.48		32.03		80	11.12	33.93
20	21.19		32.21				
30	12.12		33.28				

10 월 (October)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	19	20:25	32			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1019.0	20.8	19.5	Cc	9	C
Z m	T °C		S ‰		Z m	T °C	S ‰
0	18.55		32.99		20	15.70	33.26
10	17.72		33.06		30	14.90	33.39

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	19	18:35	72	4	7.2	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1019.1	20.8	19.7	Ns	10	R
Z m	T °C		S ‰		Z m	T °C	S ‰
0	18.05		33.17		30	16.58	33.19
10	17.51		33.12		50	16.50	33.19
20	17.08		33.08		70	16.02	33.24

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	19	17:10	88	4	12	3	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1019.1	21.0	19.5	Ns	10	R
Z m	T C		S ‰	Z m	T C		S ‰
0	18.10		33.24	50	15.79		33.42
10	17.59		33.21	75	12.48		33.57
20	17.16		33.19	85	11.82		33.59
30	17.00		33.24				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	19	14:50	89	3	15.2	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1019.1	21.4	19.5	Ns	10	R
Z m	T C		S ‰	Z m	T C		S ‰
0	18.20		33.08	50	16.28		33.37
10	17.80		33.12	75	12.00		33.60
20	17.40		33.19	85	10.79		33.53
30	17.02		33.22				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	19	18:10	92	3	16.5	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1019.5	21.2	19.3	Ns	10	R
Z m	T C		S ‰	Z m	T C		S ‰
0	18.40		33.13	50	16.92		33.42
10	18.17		33.04	75	11.75		33.60
20	17.81		33.04	90	11.28		33.59
30	17.60		33.15				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	19	11:15	88	3	12.5	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1020.5	20.9	19.9	NS	10	R
Z m	T C		S ‰	Z m	T C		S ‰
0	18.70		33.03	50	16.79		33.28
10	18.25		32.94	75	10.35		33.44
20	17.71		33.04	85	9.80		33.30
30	17.62		33.10				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	19	09:35	82	3	15.5	3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1021.0	20.0	19.2	NS	10	R
Z m	T C		S ‰	Z m	T C		S ‰
0	18.65		33.01	30	9.02		33.19
10	18.25		32.97	50	8.95		33.24
20	18.11		33.01	80	8.91		33.28

12 월 (December)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	20	20:50	36			NW 2	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1031.3	6.7		AS	10	C
Z m	T C		S ‰	Z m	T C		S ‰
0	10.99		32.96	20	10.79		32.92
10	10.87		32.95	30	10.75		-

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	20	19:18	54			NW 2	NW 1
Wind		Baro.	Air Temp		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1030.5	30.0		As	10	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	10.76	33.94	30	11.01	32.91		
10	11.01	33.01	50	10.97	32.90		
20	11.02	32.92					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	20	17:50	70	6	4	NW 2	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1031.0	7.7		As	10	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	11.26	33.06	30	11.51	33.07		
10	11.45	33.06	50	11.59	33.07		
20	11.48	33.07	68	11.55	33.10		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	20	15:40	78	7	5	NW 2	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	1	1031.1	7.5		As	10	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	11.32	33.16	30	11.54	33.13		
10	11.50	33.13	50	11.61	33.17		
20	11.52	33.17	75	11.60	33.16		

312 선 해 양 관 측 성 적

OCEANOGRAPHIC DATA, LINE 312

2 월 (February)

조사선

한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	16	04:50	86			5	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	5	1021.0	8.9	7.4	Ns	10	R
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	9.20	32.97	30	9.34	32.97		
10	9.18	32.97	50	9.24	32.97		
20	9.34	32.97	85	9.28	32.97		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	16	03:15	73			5	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	5	1021.0	8.4	6.9	Ns	10	R

Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	‰	μg-at/L	μg-at/L	μg-at/L
0	9.43	33.04	6.92	0.27	-	12.71	30	9.60	33.01	-	0.39	0.25	10.53
10	9.65	33.04	6.50	1.50	0.26	-	50	-	33.01	6.82	0.63	-	6.90
20	9.95	33.04	6.62	0.65	0.16	10.53	70	9.73	32.97	6.62	0.67	0.28	7.62

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	16	01:50	84			5	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	5	1021.5	9.1	7.2	Ns	10	R
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	10.71	33.19	30	10.70	33.22		
10	10.71	33.19	50	10.62	33.22		
20	10.70	33.22	80	10.62	33.22		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
05	16	00:10	92			4	4						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
SW	5	1021.0	9.5	8.2	NS	10	R						
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	11.80	33.64	6.40	0.98	0.11	5.08	50	12.00	33.57	6.10	0.44	0.05	-
10	11.82	33.59	6.20	0.48	0.06	3.99	70	12.06	33.59	6.00	0.50	0.05	-
20	11.83	33.59	6.10	0.29	0.06	7.62	90	12.20	33.59	6.82	0.50	0.08	6.90
30	11.92	33.57	6.10	0.42	0.05	-							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	15	22:40	103			4	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	5	1021.5	9.5	8.0	Ns	10	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	13.00	34.09	50	12.72	33.96		
10	12.54	34.00	75	13.00	33.96		
20	12.91	33.98	100	12.84	33.96		
30	13.07	33.98					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
07	15	2040	91			4	3						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
NE	4	1021.0	9.4	8.2	Ns	10	C						
Z	T	S	O	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	% ²	µg-at/L	µg-at/L	µg-at/L	m	°C	‰	% ²	µg-at/L	µg-at/L	µg-at/L
0	12.30	34.04	6.35	0.33	0.07	4.36	50	13.16	34.05	6.40	0.51	0.05	7.26
10	12.81	34.04	5.89	0.33	0.05	5.81	75	13.06	34.05	6.09	0.36	0.04	4.36
20	13.02	34.05	5.09	0.54	0.08	-	88	13.01	34.15	6.12	0.50	0	4.36
30	13.13	34.05	6.09	0.35	0.06	7.99							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	15	19:10	92			3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	4	1020.5	9.6	8.0	Ns	10	C
Z m	T C		S ‰	Z m	T C		S ‰
0	12.10		34.16	50	12.88		34.13
10	12.67		34.15	75	12.62		34.15
20	12.92		34.15	90	12.65		34.04
30	13.00		34.13				

St. No.		Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09		15	17:30	86	5	4	3	3
Wind			Baro.	Air Temp.		Cloud		Weather
Direction	Force	Dry		Wet	Type	Amount		
NE		4	1021.0	9.9	7.5	NS	10	C

Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	12.83	34.16	5.89	0.51	0.03	6.17	30	13.05	34.18	8.16	0.24	0.13	5.08
10	12.95	34.16	5.99	0.26	0.03	6.17	50	12.96	34.16	8.15	0.35	0.06	4.36
20	13.10	34.16	6.50	0.33	0.11	5.81	80	12.90	34.16	5.99	0.35	0.08	5.08

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	15	16:00	80	5	4	3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	4	1021.6	10.0	7.8	Ns	10	C
Z m	T C		S ‰	Z m	T C		S ‰
0	12.75		34.25	30	12.95		34.29
10	12.83		34.34	50	12.76		34.27
20	12.96		34.34	75	12.52		34.16

4월 (April)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	16	12:20	86	4	4	2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1013.5	18.6	17.4	St	10	F
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	10.78	33.46	30	9.86	33.87		
10	10.19	33.73	50	9.88	33.84		
20	9.90	33.82	80	9.87	33.86		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	16	14:00	72	4	4.8	5	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1014.0	19.3	17.9	St	10	F
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	11.78	33.75	30	10.04	33.86		
10	11.28	33.84	50	10.07	33.84		
20	10.26	33.89	70	10.30	33.80		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	16	15:50	84	3	6.3	1	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1011.5	18.9	17.6	St	10	F
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	10.86	33.75	30	9.36	33.93		
10	9.91	33.69	50	9.90	33.78		
20	9.31	33.66	80	10.33	33.91		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	16	17:30	92	3	15	2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1011.5	19.2	18.0	St	10	F
Z m	T C		S ‰	Z m	T C		S ‰
0	12.62		34.27	50	11.65		34.31
10	12.09		34.31	75	11.67		34.34
20	11.60		34.31	90	11.61		34.34
30	11.69		34.33				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	16	19:15	103			2	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1011.0	18.7	17.2	St	10	F
Z m	T C		S ‰	Z m	T C		S ‰
0	12.42		33.96	50	11.57		35.07
10	11.50		34.81	75	11.62		35.14
20	11.48		35.07	100	11.60		35.14
30	11.52		35.07				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	16	20:45	91			3	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1011.0	17.6	16.2	As	6	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	13.20		35.14	50	11.63		35.16
10	12.70		35.17	75	11.68		35.14
20	11.71		35.17	35	11.60		35.14
30	11.69		35.17				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	16	23:10	92			3	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1011.0	16.4	15.5	AS	8	C
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	12.96	35.19	50	11.49	35.19		
10	12.10	35.19	75	11.50	35.19		
20	11.89	35.19	90	11.45	34.83		
30	11.55	35.19					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	17	00:40	86			3	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1010.0	16.0	15.2	St	10	F
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	11.50	34.92	30	11.31	35.16		
10	11.45	34.79	50	11.27	35.16		
20	11.38	35.10	80	11.19	35.16		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	17	02:35	80			3	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1010.0	15.8	14.6	St	10	F
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	11.35	34.72	30	10.89	35.01		
10	11.25	34.79	50	11.21	35.17		
20	11.81	34.79	75	11.22	35.17		

6월 (June)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color .	Water Trans.	Wave	Swell
02	4	06:00	86	3	9	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	3	1011.0	20.0	18.8	Cc	1	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	16.65	34.34	30	13.98	34.52		
10	15.98	34.38	50	13.65	34.56		
20	14.42	34.49	80	13.52	34.56		

St. No.	Date	Time	Depth	Water Color .	Water Trans.	Wave	Swell
03	4	07:35	73	3	12	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	3	1011.5	21.5	19.8	Cc	6	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	16.88	34.27	30	13.70	34.54		
10	16.34	34.22	50	13.28	34.58		
20	14.46	34.38	70	13.32	34.58		

St. No.	Date	Time	Depth	Water Color .	Water Trans.	Wave	Swell
04	4	09:15	84	3	11	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	3	1012.0	22.6	20.5	Cs	8	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	16.70	34.38	30	13.86	34.36		
10	15.62	34.33	50	13.72	34.38		
20	14.20	34.33	80	13.44	34.31		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	4	10:45	92	3	9	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1012.0	23.2	21.0	Cs	10	C
Z m	T C		S ‰	Z m	T C		S ‰
0	16.00		34.34	50	12.82		34.38
10	16.00		34.31	75	12.38		34.51
20	15.78		34.31	90	12.40		34.51
30	13.47		34.34				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	4	12:30	103	3	11.5	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1072.0	24.6	21.6	CS	10	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	17.70	34.20	50	13.00	34.07		
10	15.63	34.15	75	12.36	34.43		
20	12.91	34.09	100	12.25	34.45		
30	13.02	34.09					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	4	14:35	91	2	13	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1011.5	22.6	20.7	Ci	4	BC
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	20.50	34.15	50	12.00	34.46		
10	16.40	33.98	75	11.45	34.42		
20	14.90	34.13	88	11.45	34.43		
30	12.50	34.33					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	4	16:15	92	2	14	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1011.5	24.0	22.5	Cl	8	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	18.00	33.78	50	11.50	34.40		
10	16.20	33.73	75	11.09	34.36		
20	13.68	34.09	90	11.04	34.36		
30	12.70	34.37					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	4	17:45	86	2	17	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1012.0	26.1	22.8	Cl	6	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	16.25	33.22	30	13.37	34.07		
10	15.42	33.12	50	10.45	34.29		
20	14.96	33.10	80	10.20	34.36		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	4	19:25	80	2	17	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1011.5	22.5	20.6	Cl	8	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	17.11	33.13	30	12.33	34.24		
10	16.09	33.22	50	9.70	34.18		
20	15.18	33.35	75	10.28	34.35		

8월 (August)

조사선 한라산 (Han Ra San.)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	8	11:10	86	3	11	3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	3	1012.5	29.2	27.9	Sc	7	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	26.00	32.02	30	18.70	33.04		
10	25.80	32.02	50	14.60	33.71		
20	23.91	31.92	80	13.62	33.77		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
03	8	12:40	73	3	14	3	2						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
E	3	1012.5	29.5	27.4	Sc	8	C						
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	27.00	32.18	4.40	1.08	0.02	12.71	30	18.80	32.57	-	1.11	1.16	10.89
10	25.90	32.18	4.40	1.31	0.26	15.61	50	14.61	32.55	4.60	1.23	0.02	14.16
20	23.11	32.52	4.90	0.87	-	11.98	70	13.85	33.87	4.40	1.14	0.06	13.79

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	8	14:20	84	3	14	3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	3	1012.0	32.0	28.8	Sc	8	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	25.70	32.23	30	23.49	32.59		
10	-	32.47	50	20.40	32.66		
20	25.32	32.54	80	13.82	33.60		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
05	8	15:50	92	3	18	2	3						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
SE	3	1011.5	32.0	28.8	Sc	8	C						
Z m	T C	S ‰	O ₂ ‰	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ ‰	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	26.10	32.29	4.70	0.98	-	10.89	50	19.71	32.79	4.80	1.34	-	15.61
10	25.20	32.21	4.40	0.98	-	10.89	75	17.85	32.92	4.90	1.23	0.15	15.25
20	23.90	32.48	4.70	1.02	-	11.62	90	13.90	33.62	5.00	1.44	0.09	15.25
30	21.82	32.61	4.60	1.08	0.10	15.25							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell	
06	8	17:45	103	3	18	3	4	
Wind		Baro.	Air Temp.		Cloud		Weather	
Direction	Force		Dry	Wet	Type	Amount		
SW	5	1009.5	30.8	28.9	Sc	8	C	
Z m	T C		S ‰		Z m	T C		S ‰
0	27.00		32.12		50	12.60		33.60
10	24.80		32.00		75	12.15		33.68
20	22.69		32.52		100	11.91		33.68
30	19.60		32.86					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
07	8	19:15	91			3	4						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
SW	5	1009.0	29.7	27.2	Ns	10	C						
Z m	T C	S ‰	O ₂ ‰	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ ‰	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	26.50	32.11	4.60	1.31	—	15.25	50	14.88	33.50	4.95	1.41	0.05	13.43
10	25.81	32.03	4.80	0.78	0.01	14.88	75	14.00	32.50	—	1.14	0.67	14.88
20	22.80	32.39	4.80	1.11	—	13.79	88	14.15	33.39	4.95	1.08	0.10	13.43
30	19.60	32.76	5.00	1.26	0.02	16.70							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	11	09:20	92	3	17	2	4
Wind		Baro.	Air Temp		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1009.0	29.0	25.9			B
Z m	T C	S ‰		Z m	T C	S ‰	
0	24.50	32.11		50	18.74	33.10	
10	23.88	32.30		75	15.47	33.26	
20	23.00	32.41		90	12.02	33.50	
30	22.64	32.83					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
09	11	10:45	86	3	20	2	3						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
SW	3	1009.0	33.0	28.9	Cc	2	B						
Z m	T C	S ‰	O ₂ %	PO ₄ -P µg-at/L	NO ₂ -N µg-at/L	SiO ₂ -Si µg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P µg-at/L	NO ₂ -N µg-at/L	SiO ₂ -Si µg-at/L
0	24.80	32.00	4.80	0.96	0.01	11.62	30	10.30	33.26	5.60	1.65	0.46	14.52
10	20.10	32.57	4.90	1.22	-	14.52	50	10.12	33.24	5.10	1.83	0.06	14.16
20	12.28	33.19	5.50	1.34	0.06	13.43	80	10.02	33.24	4.90	1.77	0.02	14.07

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	11	12:30	86	3	20	2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1009.0	28.9	27.2	Cc	2	B
Z m	T C	S ‰		Z m	T C	S ‰	
0	24.80	31.94		30	19.54	31.98	
10	24.78	31.91		50	9.90	33.19	
20	24.22	31.91		75	8.90	33.19	

10월 (October)

한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	21	06:20	80			4	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1017.8	21.8	20.9	Ns	10	R
Z m	T C		S ‰	Z m	T C		S ‰
0	18.00		33.19	30	16.28		33.30
10	17.72		33.03	50	16.20		33.21
20	16.48		33.17	75	14.50		33.48

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	21	04:20	72			4	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1017.8	21.8	20.2	Ns	9	C
Z m	T C		S ‰	Z m	T C		S ‰
0	16.16		33.90	30	16.87		33.10
10	17.40		33.01	50	16.23		33.19
20	17.20		33.08	70	13.52		33.60

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	21	02:45	83			4	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1017.5	22.0	21.4	Ns	10	C
Z m	T C		S ‰	Z m	T C		S ‰
0	17.67		33.26	30	16.52		33.21
10	17.37		33.19	50	15.70		33.35
20	16.75		33.13	80	12.50		33.46

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	21	00:45	91			4	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1017.0	21.4	19.8	Ns	10	R
Z m	T C		S ‰	Z m	T C		S ‰
0	18.01		33.35	50	15.73		33.35
10	17.25		33.24	75	15.20		33.57
20	16.90		33.31	88	14.48		33.53
30	16.12		33.31				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	20	23:10	102			4	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1017.0	21.4	19.8	Ns	10	R
Z m	T C		S ‰	Z m	T C		S ‰
0	19.20		32.95	50	15.12		33.42
10	18.10		32.99	75	13.35		33.62
20	17.49		33.12	100	11.60		33.73
30	16.21		33.33				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	20	21:00	91			4	4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1017.2	22.1	21.4	Ns	10	R
Z m	T C		S ‰	Z m	T C		S ‰
0	18.80		33.26	50	15.88		33.33
10	18.31		32.88	75	11.88		33.66
20	17.98		32.70	88	11.40		33.87
30	17.54		32.86				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
08	20	19:10	91	5	10	3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1017.5	22.5	21.2	Ns	10	R
Z m	T C	S ‰		Z m	T C	S ‰	
0	19.40	32.85		50	15.94	33.44	
10	18.69	32.66		75	11.49	33.78	
20	17.61	32.97		89	11.29	33.87	
30	17.30	33.10					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
09	20	17:15	85	3	14	3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1017.5	23.9	22.4	Ns	8	C
Z m	T C	S ‰		Z m	T C	S ‰	
0	18.80	32.97		30	17.91	32.94	
10	18.75	32.79		50	12.69	33.39	
20	18.32	32.79		80	12.20	33.68	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
10	20	15:40	80	3	16	3	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1018.0	23.5	21.9	Ns	9	C
Z m	T C	S ‰		Z m	T C	S ‰	
0	19.48	32.57		30	18.90	32.61	
10	19.38	32.41		50	12.11	33.48	
20	19.15	32.41		75	11.15	33.73	

12 월 (December)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	17	11:07	81			SW 2	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1029.5	5.8		Ac	8	C
Z m	T C		S ‰	Z m		T C	S ‰
0	15.11		33.55	30		15.97	33.85
10	15.06		33.51	50		15.63	33.76
20	16.10		33.86	75		15.12	33.67

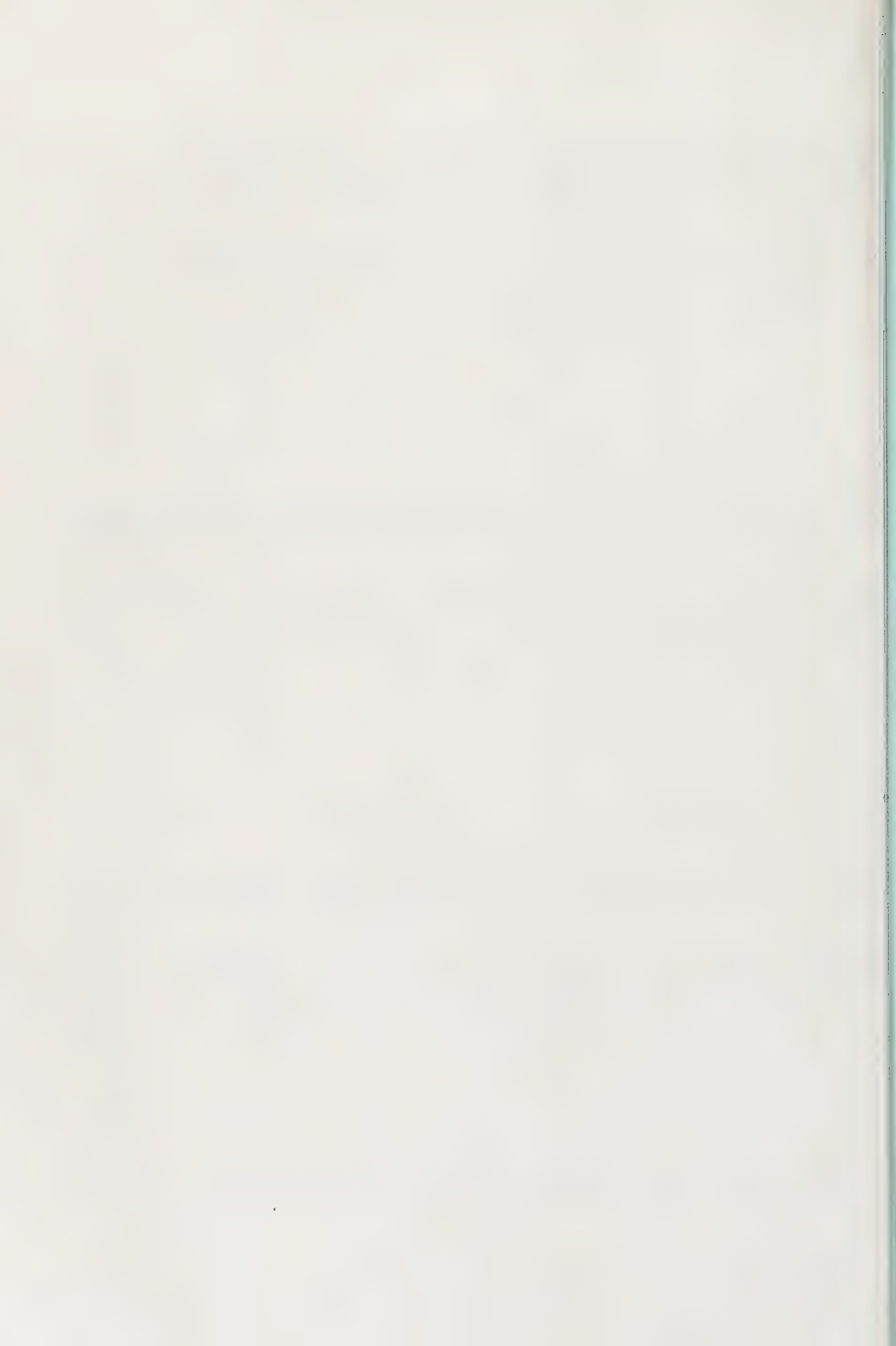
St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	17	12:28	76			E 2	E 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	2	1029.5	9.7		Ac	6	BC
Z m	T C		S ‰	Z m		T C	S ‰
0	13.73		33.36	30		13.86	33.34
10	13.84		33.35	50		13.83	33.34
20	13.84		33.34	70		13.75	33.36

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	17	13:50	68			SW 3	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1029.3	10.2		Ac	6	BC
Z m	T C		S ‰	Z m		T C	S ‰
0	12.45		33.14	30		12.19	33.10
10	12.30		33.10	50		12.14	33.13
20	12.21		33.08	65		11.71	33.01

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	17	15:12	92			SW 3	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1029.2	9.8		St. Ac	7	R
Z m	T C	S ‰	Z m	T C	S ‰		
0	12.60	33.19	50	11.18	32.86		
10	12.42	33.14	75	11.29	33.38		
20	12.11	33.06	90	11.33	33.42		
30	11.81	32.98					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	17	16:29	78			SW 3	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1029.2	8.9		St. Ac	7	R
Z m	T C	S ‰	Z m	T C	S ‰		
0	14.18	33.39	30	13.97	33.40		
10	14.47	33.45	50	13.86	33.40		
20	14.51	33.44	75	13.40	33.36		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	17	17:53	94			SW 3	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1029.5	7.4		St. Ac	6	R
Z m	T C	S ‰	Z m	T C	S ‰		
0	14.50	33.38	50	13.68	33.49		
10	13.71	33.37	75	13.58	33.35		
20	13.85	33.36	90	12.82	33.25		
30	13.64	33.38					



제 3 편

한일공동 해양 관측 성적



PART 3

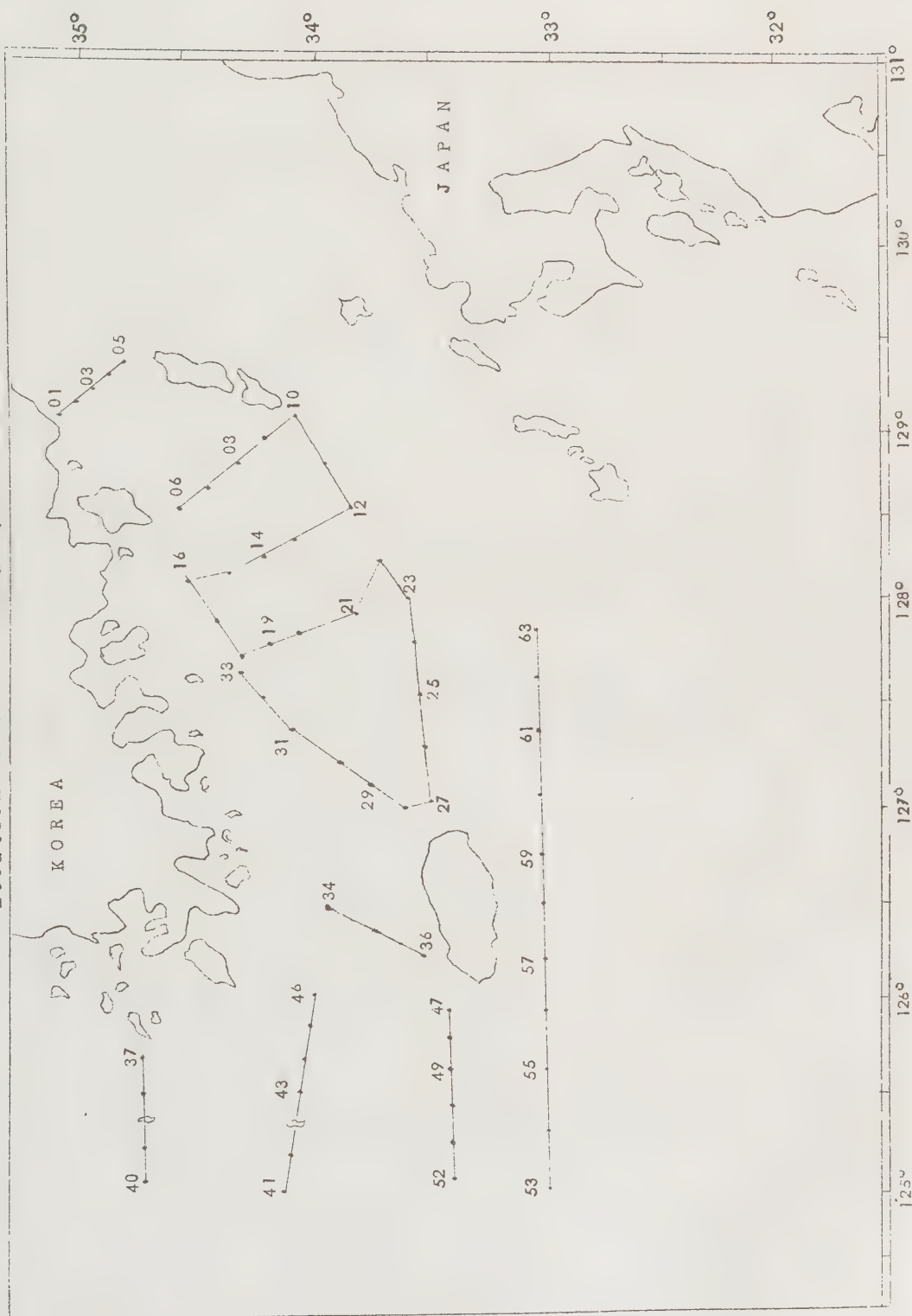
KOREA-JAPAN COOPERATIVE COEANOGRAPHIC OBSERVATIONS

1972



해양관측점 위치도

Location of the Oceanographic Stations



해양관측위치표

Position of the Oceanographic Stations

Serial No.	Latitude	Longitude	Serial No.	Latitude	Longitude	Serial No.	Latitude	Longitude
01	35°01.3'N	129°07.2'E	22	33°44.3'N	128°23.9'E	43	34°02.6'N	125°30.0'E
02	34°57.6'	129°11.2'	23	33°37.3'	128°09.2'	44	34°01.3'	125°42.0'
03	34°53.9'	129°15.4'	24	33°35.6'	127°51.9'	45	33°59.8'	125°54.0'
04	34°50.2'	129°19.5'	25	33°33.6'	127°34.0'	46	33°58.5'	126°06.0'
05	34°48.0'	129°21.8'	26	33°31.7'	127°11.8'	47	33°24.4'	126°00.0'
06	34°35.5'	128°34.5'	27	33°30.3'	127°04.5'	48	33°24.4'	125°48.0'
07	34°29.6'	128°41.2'	28	33°35.8'	127°03.2'	49	33°24.4'	125°36.0'
08	34°22.4'	128°49.7'	29	33°45.5'	127°09.2'	50	33°24.4'	125°24.0'
09	34°15.3'	128°58.0'	30	33°54.1'	127°15.2'	51	33°24.4'	125°12.0'
10	34°08.1'	129°06.3'	31	34°06.7'	127°26.8'	52	33°24.4'	125°00.0'
11	33°58.3'	128°54.0'	32	34°13.7'	127°35.4'	53	33°00.0'	125°00.0'
12	33°51.7'	128°39.0'	33	34°20.8'	127°43.9'	54	33°00.0'	125°18.0'
13	34°04.6'	128°30.0'	34	33°56.6'	126°31.4'	55	33°00.0'	125°36.0'
14	34°13.5'	128°24.0'	35	33°47.5'	126°26.3'	56	33°00.0'	125°54.0'
15	34°22.2'	128°18.4'	36	33°38.3'	126°21.3'	57	33°00.0'	126°12.0'
16	34°31.0'	128°12.2'	37	34°43.0'	125°43.9'	58	33°00.0'	126°30.0'
17	34°27.0'	128°00.5'	38	34°43.0'	125°31.9'	59	33°00.0'	126°48.0'
18	34°22.3'	127°48.5'	39	34°43.0'	125°19.4'	60	33°00.0'	127°06.0'
19	34°15.0'	127°52.1'	40	34°43.0'	125°00.0'	61	33°00.0'	127°24.0'
20	34°05.5'	127°56.9'	41	34°05.5'	125°00.0'	62	33°00.0'	127°42.0'
21	33°51.5'	128°03.0'	42	34°04.1'	125°18.0'	63	33°00.0'	128°00.0'

Month		2 월 (February) (Tae Baek San)						
St. No.		11	12	13	14	15	16	17
Day		11	12	12	12	12	12	12
Item	Time Z(m)	21:35	10:30	09:20	06:05	07:00	05:35	18:15
T	0	16.00	15.50	15.15	14.81	14.00	12.76	12.97
	10	15.13	15.48	15.10	14.78	14.00	12.79	13.30
	20	15.17	15.63	15.07	14.82	13.95	12.65	12.95
	30	15.33	15.50	15.08	14.78	13.95	12.60	12.99
	50	15.20	15.39	15.04	14.88	13.58	-	-
	75	15.21	14.72	14.62	14.89	13.48	-	-
	100	15.25	-	-	-	-	-	-
C	150	-	-	-	-	-	-	-
	200	-	-	-	-	-	-	-
	Bottom	-	(93m)	(93m)	-	-	(40m)	-
S	0	34.22	34.31	34.32	34.34	34.29	34.38	34.26
	10	34.24	34.32	34.31	34.65	34.30	34.39	34.25
	20	34.22	34.30	34.31	34.33	34.31	33.83	34.26
	30	34.22	34.31	34.31	34.63	34.30	34.30	34.26
	50	34.22	34.31	34.32	34.32	34.24	-	-
	75	34.28	34.30	34.28	34.33	34.22	-	-
	100	34.33	-	-	-	-	-	-
% ‰	150	-	-	-	-	-	-	-
	200	-	-	-	-	-	-	-
	Bottom	-	(93m)	(93m)	-	-	(40m)	-
			34.31	34.12			34.30	
Depth (m)		110	100	95	85	80	46	40
Water Trans.		-	-	15	13	-	-	-
Water Color.		-	-	4	4	-	-	-
Wave		NW 3	E 3	E 3	E 3	E 3	E 3	NE 2
Swell		NW 3	E 4	E 4	E 4	E 4	E 3	NE 3
Air Temp. (°C)		6.3	10.5	10.2	10.0	7.9	7.3	8.5
Baro. (mb)		1021.8	1025.5	1025.5	1025.5	1025.0	1025.3	1020.0
Wind		NW 4	E 4	E 4	E 4	E 4	E 3	NE 4
Cloud		-	As 8	Ns 9	Ns 9	Ns 9	-	-
Weather		R	C	C	C	C	C	C

Month		2월 (February)				
St. No.		22	24	25	26	27
Day		12	13	13	13	13
Item	Time Z (hr)	12:45	09:34	08:00	05:05	04:45
T	0	14.63	16.00	15.98	16.00	14.48
	10	15.02	15.93	15.99	15.99	15.40
	20	14.68	15.95	15.98	16.20	15.52
	30	14.82	15.90	16.03	15.99	15.38
	50	14.88	15.95	16.00	16.13	15.40
	75	14.61	15.95	16.00	16.08	15.38
C	100	12.70	15.93	—	16.06	15.17
	150	—	—	—	—	—
	200	—	—	—	—	—
	Bottom	—	(122m)	(97m)	(125m)	(125m)
			15.98	16.07	16.07	15.10
S	0	34.30	34.32	—	34.29	34.25
	10	34.32	34.30	34.30	34.28	34.24
	20	—	34.30	34.30	34.29	34.26
	30	34.31	34.31	34.31	34.29	34.25
	50	34.31	34.30	34.32	34.28	34.25
	75	34.30	34.32	34.31	34.29	34.26
‰	100	34.12	34.30	—	34.30	34.26
	150	—	—	—	—	—
	200	—	—	—	—	—
	Bottom	—	(122m)	(97m)	(125m)	(125m)
			34.30	34.32	34.30	34.27
Depth (m)		110	125	100	130	130
Water Trans.		15	15	10	—	—
Water Color.		4	4	4	—	—
Wave		E 3	NW 4	NW 4	NW 2	NW 2
Swell		E 2	NW 4	NW 4	NW 2	NW 2
Air Temp. (°C)		10.3	8.6	8.5	8.2	8.0
Baro. (mb)		1025.0	1015.0	1015.0	1016.8	1016.9
Wind		E 3	NW 4	NW 4	NW 3	NW 3
Cloud		As 4	Ns 9	Ns 10	—	—
Weather		BC	C	C	R	R

Month		4 월 (April) (Chi Ri San)						
St. No.		11	12	13	14	15	16	17
Day		11	12	12	12	12	12	12
Item	Time	22:00	15:10	13:30	12:00	10:30	07:00	08:30
	Z (m)							
T	0	15.06	15.65	15.54	15.19	12.45	12.91	13.86
	10	14.80	15.15	15.34	15.05	12.30	12.11	12.30
	20	14.28	15.10	15.20	15.30	12.35	12.16	12.89
	30	14.52	15.12	15.20	14.98	12.41	12.17	13.02
	50	14.22	14.97	15.00	14.80	11.35	-	-
	75	14.34	14.16	13.34	12.61	-	-	-
C	100	12.71	-	-	-	-	-	-
	150	-	-	-	-	-	-	-
	200	-	-	-	-	-	-	-
	Bottom	(125m) 12.52	-	-	-	-	(40m) 12.14	(40m) 12.47
S	0	34.58	34.60	34.60	34.59	34.11	33.95	33.94
	10	34.58	34.60	34.60	34.60	34.11	33.94	34.07
	20	34.58	34.59	34.60	34.60	-	34.02	34.15
	30	34.56	34.58	34.60	34.62	34.25	34.07	34.24
	50	34.54	34.58	34.58	34.59	34.21	-	-
	75	34.54	34.56	34.54	31.52	-	-	-
‰	100	34.56	-	-	-	-	-	-
	150	-	-	-	-	-	-	-
	200	-	-	-	-	-	-	-
	Bottom	(125m) 34.56	-	-	-	-	(40m) 34.39	(40m) 34.39
Depth (m)		126	86	78	82	55	42	42
Water Trans.		-	12	12	11	14	-	13
Water Color.		-	5	5	5	5	-	6
Wave		-	NE 1	E 1	E 1	NW 1	-	NW 1
Swell		-	NE 1	-	-	NW 1	-	NW 1
Air Temp. (C)		15.0	16.0	15.1	14.6	14.2	10.4	14.2
Baro. (mb)		1023.0	1025.0	1025.5	1025.5	1026.0	1025.0	1025.0
Wind		SW 4	NE 2	E 3	E 3	NW 3	NW 5	NW 3
Cloud		-	0	Ci 1	Ci 2	0	0	0
Weather		BC	B	B	B	B	B	B

Month		4월 (April)				
St. No.		22	24	25	26	27
Day		12	13	13	13	13
Item	Time	16:50	19:00	17:35	15:30	13:30
	Z (m)					
T	0	15.20	16.85	16.20	16.10	14.50
	10	15.68	16.57	16.73	16.30	14.10
	20	14.53	16.50	16.45	16.21	13.33
	30	14.42	16.41	16.50	16.36	13.32
	50	13.94	16.32	16.04	16.24	14.32
	75	13.07	16.33	16.04	15.85	14.30
	100	12.16	-	16.04	14.50	14.33
	150	-	-	-	-	-
C	200	-	-	-	-	-
	Bottom	-	(98m)	(120m)	(120m)	(120m)
S	0	34.64	34.63	34.61	34.63	34.57
	10	34.60	34.62	34.61	34.64	34.57
	20	34.58	34.62	34.61	34.62	34.56
	30	34.58	34.62	34.61	34.64	34.56
	50	34.58	34.62	34.61	34.65	34.56
	75	34.55	34.62	34.61	34.56	34.56
	100	34.46	-	34.62	34.56	34.56
	150	-	-	-	-	-
‰	200	-	-	-	-	-
	Bottom	-	(98m)	(120m)	(120m)	(120m)
			34.62	34.63	34.55	34.56
Depth (m)		103	100	123	124	125
Water Trans.		12	20	14	19	15
Water Color.		6	4	5	4	5
Wave		NW 1	SE 1	SE 1	SE 1	NE 1
Swell		NW 1	SE 1	SE 1	SE 1	NE 1
Air Temp (C)		17.1	16.2	15.8	15.0	13.3
Baro. (mb)		1025.0	1025.5	1026.0	1025.0	1025.0
Wind		NW 2	SE 1	SE 1	SE 2	NE 2
Cloud.		Cl 1	-	-	-	-
Weather		B	C	BC	C	C

Month		6 월 (June)						
St. NO.		(Tae Baek San)						
Day		11	12	13	14	15	16	17
Day		12	11	11	11	11	11	11
Item	Time	12:00	14:15	15:40	16:50	19:20	20:40	06:40
	Z (m)							
T	0	19.30	20.01	19.42	18.80	19.18	18.50	18.07
	10	19.30	20.00	19.34	18.10	18.75	17.80	18.05
	20	19.23	19.70	18.70	17.00	16.80	16.94	17.97
	30	19.30	19.48	17.55	16.56	15.35	16.60	16.38
	50	19.09	17.56	15.95	14.90	14.80	-	-
	75	17.41	15.84	15.11	14.90	-	-	-
	100	15.89	14.95	-	-	-	-	-
	150	-	-	-	-	-	-	-
	200	-	-	-	-	-	-	-
	Bottom	(120m)	-	(90m)	-	(68m)	(40m)	(38m)
		14.90	-	15.00	-	14.55	15.70	15.28
S	0	34.11	33.50	34.15	33.98	33.81	33.84	33.92
	10	34.14	33.46	34.19	34.19	33.97	33.99	33.93
	20	34.16	33.54	34.31	34.31	34.27	34.07	33.95
	30	34.15	33.78	34.33	34.33	34.41	34.11	34.24
	50	34.16	-	34.53	34.53	34.46	-	-
	75	34.48	34.60	34.54	34.21	-	-	-
	100	34.41	34.59	-	-	-	-	-
	150	-	-	-	-	-	-	-
	200	-	-	-	-	-	-	-
	Bottom	(120m)	-	(90m)	-	(68m)	(40m)	(38m)
		34.60	-	34.57	-	33.40	34.25	34.37
Depth (m)		125	105	92	80	70	45	40
Water Trans.		13	12	12	11	10	-	-
Water Color.		3	4	4	4	4	-	-
Wave		NW 1	SE 1	SE 2	SE 2	SE 2	SE 2	SE 1
Swell		NW 2	SE 2	SE 3	SE 3	SE 3	SE 3	SE 1
Air Temp.(C)		19.8	20.5	19.8	19.2	18.9	18.4	18.8
Baro. (mb)		995.0	1004.5	1002.4	1002.2	999.4	998.4	1005.7
Wind		NW 2	SE 3	SE 3	SE 3	SE 4	SE 4	SE 2
Cloud		As 10	-	-	-	-	-	-
Weather		G	R	R	R	R	R	-

Month		6월 (June)				
St. NO.		22	24	25	26	27
Day		11	10	10	10	10
Item	Time Z(m)	13:00	14:40	16:50	20:35	21:40
T	0	20.13	20.90	21.11	20.80	21.30
	10	20.07	21.05	19.72	20.40	20.46
	20	19.56	19.85	19.25	19.61	19.60
	30	19.11	19.79	18.53	18.25	18.40
	50	17.30	16.60	16.44	17.14	16.80
	75	16.30	16.18	15.48	16.06	15.23
	100	14.79	15.48	14.33	14.93	14.73
C	150	-	-	-	-	-
	200	-	-	-	-	-
	Bottom		(120 m) 14.59		(120 m) 14.50	(125 m) 14.65
S	0	33.52	32.95	32.69	33.42	34.03
	10	33.49	32.97	32.73	33.43	33.97
	20	33.48	32.79	33.20	34.01	33.91
	30	33.64	33.11	33.63	34.00	34.37
	50	34.41	33.77	34.17	34.51	34.53
	75	34.59	34.41	34.52	34.59	34.56
	100	34.61	34.49	34.56	34.56	34.58
%o	150	-	-	-	-	-
	200	-	-	-	-	-
	Bottom	-	(120 m) 34.57	-	(120 m) 34.56	(125 m) 34.57
Depth (m)		110	122	110	125	130
Water Trans.		16	16	12	-	-
Water Color.		2	3	3	-	-
Wave		SE 1	S 1	S 1	S 1	S 1
Swell		SE 2	S 1	S 2	S 1	S 1
Air Temp. (C)		21.5	25.2	20.2	20.0	21.0
Baro. (mb)		1004.5	1007.0	1006.8	1007.0	1007.0
Wind		SE 3	S 2	S 4	S 3	S 2
Cloud		As 10	Ci 5	As 8	-	-
Weather		C	BC	C	-	-

Month		8 월 (August)						
St. No.		(Chi Ri San)						
Day		11	12	13	14	15	16	17
Time		16	16	17	17	17	17	17
Item	Z (m)	23:30	21:25	15:50	03:45	05:20	09:00	07:20
T	0	27.10	26.80	27.29	26.92	27.03	26.34	24.69
	10	25.53	25.30	26.80	25.78	23.81	26.22	23.03
	20	23.15	25.20	25.36	25.02	22.49	23.31	22.11
	30	22.87	21.25	24.78	22.60	19.95	21.09	19.08
	50	20.32	19.30	20.30	16.00	14.53	16.48	14.41
	75	16.55	15.04	15.45	14.51	14.49	-	-
C	100	14.80	14.98	-	-	-	-	-
	150	-	-	-	-	-	-	-
	200	-	-	-	-	-	-	-
	Bottom	-	-	(80m) 14.59	-	-	-	-
S	0	32.07	32.06	32.05	32.09	32.14	32.00	32.52
	10	32.97	32.13	32.00	32.01	32.55	32.32	32.71
	20	32.38	32.12	32.11	32.24	32.76	32.63	32.85
	30	33.08	33.03	32.35	32.80	33.15	32.84	33.30
	50	33.79	33.89	33.11	34.31	34.28	33.88	34.26
	75	34.20	34.33	34.06	34.32	34.31	-	-
‰	100	34.38	34.42	-	-	-	-	-
	150	-	-	-	-	-	-	-
	200	-	-	-	-	-	-	-
	Bottom	-	-	(80m) 34.35	-	-	-	-
Depth (m)		105	105	88	78	78	52	58
Water Trans.		-	-	22	-	-	9	-
Water Color.		-	-	4	-	-	5	-
Wave		E 1	E 1	SE 1	E 1	E 1	E 2	E 1
Swell		E 2	E 2	SE 2	SE 2	E 2	E 2	E 2
Air Temp. (C)		27.1	27.2	29.2	26.8	27.0	26.5	26.8
Baro. (mb)		1013.2	1013.0	1014.7	1013.1	1013.0	1013.4	1013.0
Wind		E 3	E 3	SE 2	E 2	E 2	E 2	E 2
Cloud		-	-	Cl 2	0	0	0	0
Weather		-	-	B	B	B	B	B

Month		8 월 (August)				
St. NO.		22	24	25	26	27
Day		16	15	15	15	15
Item	Time	19:20	00:30	02:00	03:30	05:25
	Z (m)					
T	0	27.05	27.03	27.20	26.90	26.08
	10	25.38	26.94	26.22	26.30	25.40
	20	24.88	26.55	26.03	25.95	24.90
	30	21.75	26.51	25.40	20.80	21.45
	50	19.66	26.45	21.91	17.90	18.73
	75	17.10	19.95	16.68	15.90	15.90
C	100	-	15.40	-	-	14.75
	150	-	-	-	-	-
	200	-	-	-	-	-
	Bottom	(94m)	-	(86m)	(90m)	(115m)
		14.90		15.00	14.85	14.40
S	0	32.52	32.80	32.55	32.43	32.69
	10	-	33.04	-	33.74	32.67
	20	32.85	32.76	33.85	34.02	32.95
	30	32.93	33.12	34.13	34.08	33.18
	50	33.04	34.14	34.05	34.39	33.97
	75	33.87	34.19	34.29	34.41	34.18
No	100	-	34.62	-	-	34.39
	150	-	-	-	-	-
	200	-	-	-	-	-
	Bottom	(94m)	-	(86m)	(90m)	(115m)
		34.33		34.46	34.50	34.18
Depth (m)		95	105	88	92	117
Water Trans.		-	-	-	-	-
Water Color.		-	-	-	-	-
Wave		NE 1	SE 1	SE 1	SE 1	SE 1
Swell		NE 2	SE 1	SE 1	SE 1	SE 1
Air Temp(C)		27.2	28.0	26.8	26.8	26.0
Baro. (mb)		1012.7	1012.5	1012.5	1013.2	1013.0
Wind		NE 2	SE 1	SE 1	SE 1	SE 2
Cloud		-	-	-	-	-
Weather		-	LC	-	-	-

Month		10 월 (October) (Tae Baek San)						
St. NO.		11	12	13	14	15	16	17
Day		14	14	14	14	14	15	14
Item	Time Z (m)	19:00	17:50	20:25	21:30	22:55	10:20	09:15
T	0	21.10	23.75	23.45	19.10	21.05	18.80	18.48
	10	20.40	23.63	23.50	18.53	18.65	18.80	18.38
	20	20.49	23.73	23.00	18.11	18.40	18.62	17.80
	30	19.05	23.75	22.98	16.70	15.49	18.15	15.91
	50	18.23	17.15	18.20	16.42	14.50	14.31	14.78
	75	14.13	15.80	15.38	14.73	14.38	-	-
C	100	-	15.22	-	-	-	-	-
	150	-	-	-	-	-	-	-
	200	-	-	-	-	-	-	-
	Bottom	(98m) 14.13	-	(90m) 15.60	(85m) 14.55	-	-	-
S	0	32.83	33.41	33.41	33.04	32.95	33.00	33.06
	10	32.65	33.35	33.40	33.04	32.97	32.96	33.04
	20	32.69	33.39	33.37	33.13	33.49	32.99	33.95
	30	32.86	33.39	33.37	33.41	33.68	33.16	34.02
	50	33.34	33.47	34.38	33.99	34.12	34.01	-
	75	34.05	34.49	34.32	34.08	34.09	-	-
%	100	-	34.44	-	-	-	-	-
	150	-	-	-	-	-	-	-
	200	-	-	-	-	-	-	-
	Bottom	(98m) 34.09	-	(90m) 34.47	(85m) 34.11	-	-	-
Depth (m)		100	105	98	90	90	55	52
Water Trans.		-	-	-	-	-	-	12
Water Color.		-	-	-	-	-	-	5
Wave		SE 1	N 1	SE 1	SE 1	SE 1	SE 1	NW 1
Swell		SE 1	N 1	SE 1	SE 1	SE 1	SE 1	NW 1
Air Temp. (C)		20.3	21.0	20.0	19.9	19.0	18.5	20.0
Baro. (mb)		1018.4	1018.5	1018.4	1018.5	1018.5	1018.6	1019.0
Wind		SE 3	N 1	SE 3	SE 3	SE 3	SE 3	NW 1
Cloud		-	0	-	-	-	-	-
Weather		BC	B	BC	BC	BC	BC	B

Month		10월 (October)				
St. No.		22	24	25	26	27
Day		14	13	13	13	13
Item	Time	14:30	18:35	20:10	21:35	23:00
	Z(m)					
T	0	24.09	23.51	23.38	23.10	23.00
	10	23.95	23.53	23.41	23.10	23.00
	20	23.85	23.60	23.48	23.11	23.10
	30	24.02	23.72	23.30	20.80	21.70
	50	21.48	22.48	19.75	19.43	16.61
	75	19.65	18.25	17.90	18.10	15.24
	100	15.83	17.70	-	16.97	14.78
C	150	-	-	-	-	-
	200	-	-	-	-	-
Bottom		-	-	(98m) 15.50	(120m) 14.70	(120m) 14.35
S	0	33.47	33.49	33.14	33.05	33.17
	10	33.44	33.47	33.14	33.01	33.10
	20	33.44	33.51	33.21	33.03	33.20
	30	33.45	33.61	33.35	33.75	33.03
	50	34.06	33.92	34.13	34.30	33.24
	75	34.38	34.44	34.55	34.59	33.90
	100	34.48	34.54	-	34.50	34.05
%	150	-	-	-	-	-
	200	-	-	-	-	-
Bottom		-	-	(98m) 34.55	(120m) 34.53	(120m) 34.19
Depth (m)		105	105	100	125	128
Water Trans.		12	-	-	-	-
Water Color.		4	-	-	-	-
Wave		N 1	N 1	NW 1	NW 1	NW 1
Swell		N 1	N 1	NW 1	NW 1	NW 1
Air Temp. (°C)		21.0	20.5	20.3	20.0	20.0
Baro. (mb)		1018.5	1017.6	1018.0	1018.7	1018.7
Wind		N 2	N 4	NW 2	NW 3	NW 3
Cloud		Cl 2	-	-	-	-
Weather		B	BC	BC	B C	B C

Month		12월 (December) (Han Ra San)						
St. No.		11	12	13	14	15	16	17
Day		22	22	22	22	22	22	-
Item	Time	04:10	00:25	06:15	07:45	09:15	10:30	-
	Z (m)							
T	0	15.20	15.80	13.69	13.50	13.47	13.53	-
	10	14.52	15.41	13.92	13.53	13.49	13.67	-
	20	14.50	15.09	13.91	13.57	13.49	12.82	-
	30	14.00	15.00	13.09	13.56	13.51	12.65	-
	50	14.40	14.89	13.84	13.56	13.40	-	-
	75	14.40	14.78	13.91	13.60	-	-	-
C	100	14.23	13.78	-	-	-	-	-
	150	-	-	-	-	-	-	-
	200	-	-	-	-	-	-	-
	Bottom	-	-	-	-	(65m)	(44m)	-
S	0	33.45	34.01	33.83	33.76	33.77	33.89	-
	10	33.98	33.99	33.83	33.75	33.77	33.67	-
	20	33.98	33.97	33.83	33.77	33.77	33.83	-
	30	33.93	33.99	33.83	33.75	33.77	33.85	-
	50	33.93	33.94	33.84	33.75	33.75	-	-
	75	33.92	33.98	33.83	33.75	-	-	-
%	100	33.93	33.99	-	-	-	-	-
	150	-	-	-	-	-	-	-
	200	-	-	-	-	-	-	-
	Bottom	-	-	-	-	(65m)	(44m)	-
						33.76	33.84	-
Depth (m)		108	112	87	81	67	46	-
Water Trans.		-	-	-	6	5.5	5	-
Water Color.		-	-	-	6	6	6	-
Wave		NW 2	NW 2	SE 1	SE 2	SE 2	SE 2	-
Swell		NW 2	NW 1	SE 1	SE 1	SE 1	SE 1	-
Air Temp. (C)		6.5	7.1	6.2	5.5	5.5	6.1	-
Baro. (mb)		1030.0	1030.7	1030.5	1030.0	1030.0	1030.0	-
Wind		NW 2	NW 2	SE 4	SE 4	SE 4	SE 5	-
Cloud		-	-	-	As 10	As 10	As 10	-
Weather		-	-	-	C	C	C	-

Month		12월 (December)				
St. No.		22	24	25	26	27
Day		-	11	11	11	11
Item	Time	-	13:25	11:53	10:34	09:08
	Z(m)					
T	0	-	18.90	18.20	18.80	18.80
	10	-	19.24	18.74	18.24	18.00
	20	-	19.20	18.65	18.59	18.50
	30	-	19.21	18.87	18.59	18.54
	50	-	19.25	18.75	18.49	18.55
	75	-	19.06	18.73	18.44	18.25
C	100	-	16.71	18.25	18.15	16.10
	150	-	-	-	-	-
	200	-	-	-	-	-
	Bottom	-	-	-	-	-
S	0	-	33.96	33.93	33.90	33.92
	10	-	33.95	33.91	33.87	33.90
	20	-	33.94	33.87	33.88	33.91
	30	-	33.94	33.86	33.93	33.91
	50	-	33.94	33.89	33.87	33.87
	75	-	33.95	33.94	34.52	33.92
‰	100	-	34.54	34.53	-	34.45
	150	-	-	-	-	-
	200	-	-	-	-	-
	Bottom	-	-	-	-	-
Depth (m)		-	102	104	106	112
Water Trans.		-	19	19	17	16
Water Color.		-	4	4	4	4
Wave		-	E 1	E 1	E 3	NE 3
Swell		-	E 1	E 1	E 1	NE 3
Air Temp. (C)		-	14.7	13.1	12.8	15.4
Baro. (mb)		-	1023.2	1022.9	1022.9	1021.2
Wind		-	E 3	E 3	E 5	NE 5
Cloud		-	Cl 4	Cl 5	Cs 7	Cs 10
Weather		-	BC	BC	BC	C

제 4 편

특별 해양 관측 성적



PART 4

MISCELLANEOUS COEANOGRAPHIC OBSERVATIONS

1972

1871

1872

1873

1874

1875

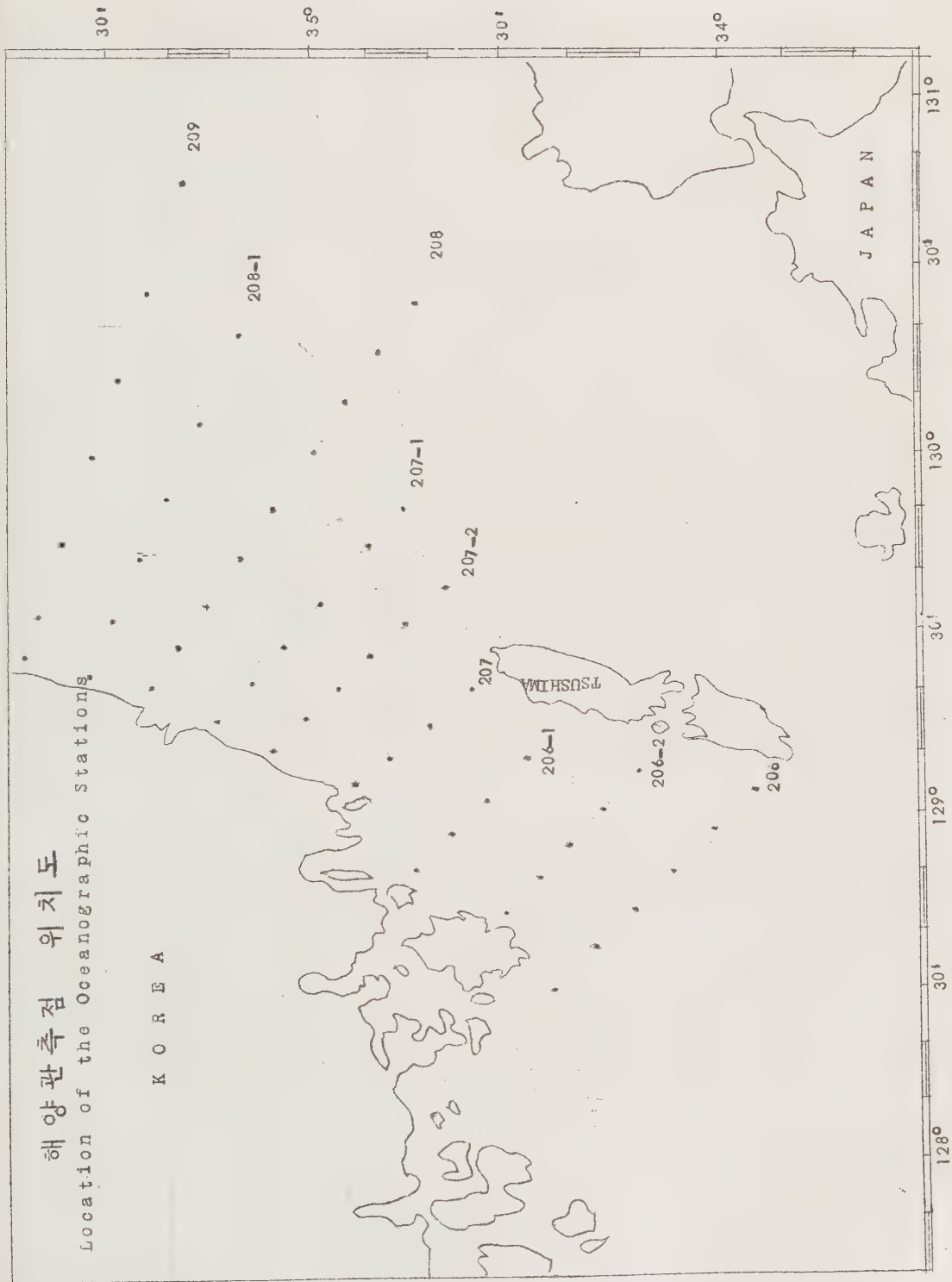
1876

1877

해양관측점 위치도

Location of the Oceanographic Stations

K O R E A



海 洋 観 測 点 位 置 表
Position of the Oceanographic Stations

St. No. Line	01	02	03	04	05	06	07
208-1	35°38.7'	35°33.6'	35°28.5'	35°23.0'	35°18.0'	35°12.5'	
	129°32.3'	129°43.0'	129°53.0'	130°04.0'	130°13.5'	130°24.0'	
207-1	35°20.0'	35°15.0'	35°10.0'	35°05.0'	35°01.0'	34°56.0'	34°51.0'
	129°24.0'	129°30.0'	129°35.0'	129°41.0'	129°47.0'	129°53.0'	129°59.0'
207-2	35°09.5'	35°05.0'	35°00.0'	34°55.0'	34°50.0'	34°45.0'	
	129°18.0'	129°23.0'	129°28.0'	129°34.0'	129°40.0'	129°45.0'	
206-1	34°53.0'	34°48.0'	34°43.0'	34°38.0'			
	128°57.0'	129°03.0'	129°08.0'	129°13.0'			
206-2	34°44.5'	34°39.5'	34°34.5'	34°29.5'	34°24.5'		
	128°46.5'	128°52.0'	128°57.5'	129°03.0'	129°09.0'		

208-1 선 해 양 관 측 성 적
OCEANOGRAPHIC DATA, LINE 208-1

2 월 (February)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	22	12:00	50		7	2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1020.0	5.6		Cl	6	BC
Z m	T C		S ‰		Z m	T C	S ‰
0	11.36		34.52		30	13.52	34.32
10	12.22		34.53		45	13.22	34.54
20	13.51		34.53				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	22	13:30	135		6	2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1020.0	6.8		Ns	10	C
Z m	T C		S ‰		Z m	T C	S ‰
0	11.20		34.53		50	13.58	34.52
10	10.38		34.53		75	13.60	-
20	12.22		34.53		100	13.11	34.48
30	13.51		34.52		130	12.70	34.39

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	22	15:00	137		6	2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1020.0	6.8		Ns	8	C
Z m	T C		S ‰		Z m	T C	S ‰
0	11.69		34.55		50	14.30	34.54
10	12.00		34.55		75	14.00	34.50
20	14.31		34.55		100	13.60	34.50
30	14.31		34.55		130	13.00	-

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	22	16:35	155			2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1019.0	6.4		Ns	10	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	11.40	34.56	75	14.11	34.55		
10	13.45	34.57	100	14.11	34.56		
20	14.21	34.58	125	14.05	34.57		
30	14.20	34.57	150	14.00	34.57		
50	14.20	34.56					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	22	18:00	142			2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1018.0	5.8		Ns	10	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	11.21	34.53	75	13.10	34.46		
10	12.65	34.53	100	12.80	34.46		
20	13.60	34.53	125	12.70	34.45		
30	13.50	34.52	140	12.61	34.44		
50	13.30	34.50					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	22	19:30	130				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1018.0	6.0				
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	11.60	34.50	50	12.50	34.47		
10	12.50	34.50	75	12.45	34.44		
20	12.70	34.50	100	12.25	34.45		
30	12.70	34.50	125	12.20	34.37		

4월 (April)

조사선 지리산 (Chi Ri San)

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	23	18:05	50	3	10	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1018.5	13.8		Ci	5	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	14.47		34.11	30	13.96		34.11
10	14.03		34.10	48	12.57		34.42
20	14.02		34.13				

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	23	17:05	135	3	11	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1020.5	13.4		Ci	6	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	15.09		34.49	50	14.80		34.49
10	15.05		34.49	75	14.14		34.49
20	14.99		34.50	100	13.59		34.47
30	14.94		34.49	125	12.13		34.42

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	23	15:35	137	3	12	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1020.5	13.0		As	10	C
Z m	T °C		S ‰	Z m	T °C		S ‰
0	14.83		34.50	50	14.76		34.49
10	14.73		34.50	75	14.71		34.49
20	14.75		34.49	100	14.54		34.48
30	14.76		34.50	125	13.72		34.49

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	23	14:10	155	3	14	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1021.0	13.1		As	10	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	14.71	34.47	75	14.35	34.48		
10	14.59	34.47	100	14.05	34.49		
20	14.43	34.47	125	13.68	34.48		
30	14.49	34.48	150	13.72	34.48		
50	14.42	34.48					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	23	12:35	142	3	14	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1020.0	12.1		As	10	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	14.10	34.45	75	13.64	34.46		
10	14.41	34.46	100	13.59	34.47		
20	14.20	34.47	125	13.38	34.47		
30	14.16	34.46	140	13.39	34.48		
50	13.84	34.49					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	23	11:05	130	3	14	2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1020.0	11.1		As	10	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	12.40	34.42	50	12.55	34.39		
10	12.73	34.42	75	12.10	34.38		
20	12.70	34.42	100	11.34	34.36		
30	12.68	34.41	125	11.02	34.37		

6월 (June)

조사선 지리산 (Chi Ri San)

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	13	10:35	50	3	15	2	3
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1005.0	18.0	16.2	Cl	6	BC
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	19.58	34.25	30	15.00	34.41		
10	17.50	34.31	47	12.56	34.36		
20	15.79	34.33					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	13	12:10	130	3	15	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1005.0	18.2	17.0	Cl	5	BC
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	19.11	34.26	50	17.32	34.41		
10	19.31	34.27	75	18.62	34.43		
20	18.33	34.28	100	15.78	34.35		
30	19.14	34.31	125	11.21	34.24		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	13	14:00	155	3	17	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1005.0	19.0	17.8	Cl	4	BC
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	19.21	34.24	75	17.37	34.45		
10	19.18	34.25	100	16.85	34.45		
20	19.16	34.25	125	16.06	34.49		
30	19.37	-	150	13.52	34.50		
50	15.47	34.43					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	13	15:40	130	3	18	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1005.0	19.2	17.9	Cl	5	BC
Z	T	S	%	Z	T	S	
m	C			m	C		
0	18.96			75	16.11		
10	18.71			100	17.93		
20	18.63			125	17.30		
30	18.78			147	15.03		
50	18.45						

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	13	17:20	140	3	19	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	4	1005.5	20.2	18.2	Cl	4	BC
Z	T	S	%	Z	T	S	
m	C			m	C		
0	18.78			50	18.00		
10	18.69			75	15.35		
20	18.17			100	14.64		
30	18.27			125	11.26		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	13	19:10	130	3	20	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1005.5	21.2	18.4	Cl	4	BC
0	16.36						
10	18.54						
20	17.06						
30	15.96						

8 일 (August)

조사선 지리산 (Chi Ri San)

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	24	04:45	50			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1010.0	24.4	23.8	CI	2	B
Z m	T C		S ‰		Z m	T C	S ‰
0	24.82		32.64		30	24.50	32.71
10	25.05		32.62		48	17.40	33.66
20	24.90		32.69				

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	24	04:10	135			2	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1014.0	23.2	21.8	CI	2	B
Z m	T C		S ‰		Z m	T C	S ‰
0	24.51		32.26		50	17.11	33.74
10	24.75		32.52		75	14.40	34.22
20	24.40		32.43		100	12.90	34.24
30	15.44		32.67		125	6.30	34.01

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	24	10:25	137	2	11	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	4	1013.0	24.4	21.2	CI	3	BC
Z m	T C		S ‰		Z m	T C	S ‰
0	25.19		32.52		50	16.84	33.90
10	25.24		32.40		75	15.32	34.29
20	24.73		32.57		100	15.00	34.32
30	21.60		33.10		125	9.02	34.30

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	24	08:45	155	2	19	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	4	1014.0	27.4	24.5	Cl	3	BC
Z m	T C		S ‰		Z m	T C	S ‰
0	25.25		32.59		75	22.20	33.87
10	25.50		32.57		100	16.70	34.33
20	25.52		32.60		125	14.84	34.50
30	25.65		32.61		150	8.98	34.16
50	25.41		32.59				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	24	07:10	142				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	4	1014.5	24.9	23.2	Cl	3	BC
Z m	T C		S ‰		Z m	T C	S ‰
0	25.55		32.96		75	24.00	33.76
10	25.65		32.94		100	20.00	33.89
20	25.00		32.94		125	17.00	-
30	25.00		32.95		140	12.02	33.94
50	24.95		33.10				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	24	05:35	130				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	4	1015.0	25.2	23.4	Cl	3	BC
Z m	T C		S ‰		Z m	T C	S ‰
0	23.01		32.77		50	24.85	33.04
10	25.01		32.75		75	18.23	33.97
20	25.11		32.73		100	15.77	34.37
30	24.97		33.00		125	12.20	-

10 월 (October)

조사선 지리산 (Chi Ri San)

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	31	10:25	50		8	1	1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	5	1021.0	18.5				B
Z m	T C	S ‰	Z m	T C	S ‰		
0	15.10	33.35	30	14.00	33.58		
10	15.80	33.35	48	11.30	33.92		
20	15.10	33.34					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	31	12:00	135		8	1	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	5	1021.0	18.5				B
Z m	T C	S ‰	Z m	T C	S ‰		
0	15.00	33.40	50	11.62	33.97		
10	15.25	33.44	75	7.60	33.91		
20	14.30	33.63	100	5.26	33.87		
30	13.90	33.84	125	5.10	33.85		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	31	13:30	137		9	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1022.0	16.0				B
Z m	T C	S ‰	Z m	T C	S ‰		
0	15.30	33.41	50	10.05	33.85		
10	15.32	33.41	75	8.40	33.93		
20	14.38	33.41	100	8.00	33.94		
30	13.60	33.68	125	5.20	33.85		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	31	1505	155		8	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	5	1022.0	15.5				B
Z m	T C	S ‰	Z m	T C	S ‰		
0	14.60	33.32	75	9.20	33.94		
10	15.55	33.31	100	9.60	34.01		
20	15.21	33.33	125	8.40	33.92		
30	14.60	33.38	150	5.20	-		
50	12.28	33.86					

St. No.	Date	Time	Depth	Water Color	Water Trans.	Wave	Swell
05	31	16:40	142		9	2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	4	1022.0	16.0				B
Z m	T C	S ‰	Z m	T C	S ‰		
0	15.60	33.24	50	15.90	33.37		
10	16.11	33.21	75	15.11	33.70		
20	16.40	33.31	100	11.11	34.00		
30	16.02	33.45	125	8.30	33.97		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	31	18:10	130			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	4	1021.0	16.5				B
Z m	T C	S ‰	Z m	T C	S ‰		
0	15.35	32.73	50	16.85	33.42		
10	16.95	33.19	75	15.75	34.26		
20	17.05	33.10	100	14.20	34.03		
30	16.32	33.10	125	14.00	34.29		

12월 (December)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	8	08:00	50			4	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	6	1020.0	7.0	5.0	C1	3	BC
Z m	T C		S ‰		Z m	T C	S ‰
0	15.02		33.81		30	11.46	33.99
10	13.79		33.81		48	11.05	34.29
20	12.20		33.82				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	8	06:40				2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	6	1020.0	7.0	5.0	C1	2	B
Z m	T C		S ‰		Z m	T C	S ‰
0	15.32		33.65		50	13.70	34.08
10	14.70		33.62		75	12.01	33.99
20	13.83		33.96		100	6.95	33.85
30	13.81		34.04		125	6.78	-

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	8	05:20	137			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	6	1019.0	8.0	6.0			B
Z m	T C		S ‰		Z m	T C	S ‰
0	16.64		33.77		50	15.13	33.74
10	15.95		33.80		75	14.37	33.76
20	15.91		33.79		100	14.30	33.85
30	15.14		33.78		125	14.00	34.15

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
54	8	03:55				2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	6	1018.0	9.0	7.0			B
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	17.95	33.80	75	15.71	33.90		
10	17.19	33.88	100	15.60	33.90		
20	17.26	33.87	125	15.34	34.10		
30	15.89	33.90	150	15.33	34.11		
50	15.73	33.89					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
55	8	02:30	140			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	6	1017.0	9.0	8.0			B
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	16.50	33.61	50	15.11	33.67		
10	16.42	33.68	75	14.65	33.56		
20	15.92	33.67	100	14.71	33.89		
30	15.55	33.67	125	14.40	34.22		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
56	8	01:10	130			2	2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	6	1017.0	9.2	8.0			B
Z	T	S	Z	T	S		
m	C	‰	m	C	‰		
0	16.58	33.78	50	15.93	33.80		
10	16.43	33.78	75	15.55	33.87		
20	16.43	33.78	100	15.22	33.85		
30	16.24	33.78	125	12.86	34.22		

207-1 선 해 양 관 측 성 적

OCEANOGRAPHIC DATA, LINE 207-1

2월 (February)

조각선 태백산 (Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	9	06:10	60			SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1010.0	9.0				C
Z m	T C	S ‰	Z m	T C	S ‰		
0	12.77	34.32	30	12.80	34.30		
10	12.80	34.32	50	11.90	34.21		
20	12.80	34.30					

St. No.		Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell					
02		9	07:05	115			SE 1	SE 1					
Wind			Baro.	Air Temp.		Cloud		Weather					
Direction	Force	Dry		Wet	Type	Amount							
SE		3	1010.0	9.1				C					
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	13.30	34.32	5.95	0.38	0.59	1.35	50	13.31	34.32	5.85	0.59	0.57	3.51
10	13.38	34.36	6.02	0.61	0.24	2.43	75	13.25	34.29	5.93	0.38	1.03	6.75
20	13.35	34.32	5.92	0.47	0.57	5.67	100	13.03	34.28	5.75	0.45	1.13	4.05
30	13.40	34.31	5.95	0.47	0.41	6.48							

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	9	08:05	130	3	12	SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1010.0	9.1				C
Z m	T C	S ‰	Z m	T C	S ‰		
0	13.40	34.04	50	13.46	34.30		
10	13.44	34.29	75	13.44	34.31		
20	13.49	34.31	100	13.42	34.32		
30	13.48	34.35	125	13.46	-		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	9	09:00	128	3	12	SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1011.0	9.5		Ns	8	C
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	NO ₃ -N μg-at/L	SiO ₂ -Si μg-at/L
0	13.52	34.33	5.93	0.50	0.27	1.08	50
10	13.55	34.32	6.03	0.32	1.46	2.16	75
20	13.52	34.32	5.93	0.23	0.95	1.89	100
30	13.41	34.38	5.84	0.18	0.57	7.56	125

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	9	10:00	127	3	13	SE 1	SE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1012.0	9.5		As	8	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	13.46	34.34	50	13.35	34.34		
10	13.51	34.34	75	13.40	34.34		
20	13.38	34.34	100	13.31	34.32		
30	13.40	34.33	125	13.25	34.32		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	9	11:05	124	3	14	SE 1	SE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1012.0	9.7		Ns	8	C
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	NO ₃ -N μg-at/L	SiO ₂ -Si μg-at/L
0	13.51	34.34	5.83	0.52	1.92	5.40	50
10	13.51	34.33	5.83	0.32	2.30	1.35	75
20	13.64	34.33	5.93	0.45	1.97	2.43	100
30	13.51	34.33	5.84	0.41	1.81	1.89	120

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	9	12:00	124	3	13	SE 2	SE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	4	1012.0	9.5		Ns	8	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	13.60	34.33	50	13.52	34.37		
10	13.60	34.33	75	13.54	34.33		
20	13.57	34.33	100	13.50	34.32		
30	13.60	34.34	120	13.51	34.32		

4월 (April)

조사선 지리산 (Chi Ri San)

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	10	11:10	50	6		SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1025.0	14.6		Cu	3	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	13.19	34.05	30	13.90	34.53		
10	12.41	34.08	48	13.76	34.53		
20	13.35	34.30					

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	10	12:15	110	5		SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	5	1025.0	13.6		Cu	4	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	14.30	34.57	50	13.68	34.57		
10	14.40	34.58	75	12.49	34.56		
20	14.19	34.54	100	11.85	34.53		
30	13.82	34.58					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	10	13:33	124	3	24	SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1022.0	12.2		Cu	4	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	14.95	34.57	50	14.33	34.58		
10	14.82	34.56	75	13.14	34.57		
20	14.89	34.57	100	12.81	34.53		
30	14.90	34.56	120	12.40	34.52		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	10	14:35	150	3	25	SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1023.0	12.4		Cu	4	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	14.60	34.59	75	14.22	34.59		
10	15.03	34.58	100	13.38	34.55		
20	15.00	34.58	125	13.51	34.56		
30	15.12	34.58	148	13.21	34.58		
50	15.01	34.59					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	10	15:45	128	3		SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1022.0	13.3		Cu	4	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	14.75	34.62	50	14.80	34.59		
10	14.92	34.58	75	14.04	34.55		
20	14.85	34.59	100	13.92	34.57		
30	14.80	34.61	125	13.78	34.57		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	10	16:55	128	3	20	SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1022.0	13.4		Cu-Sc	3	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	15.05	34.57	50	14.26	34.58		
10	15.00	34.56	75	14.13	34.57		
20	15.04	34.57	100	14.87	34.57		
30	14.41	-	125	13.25	34.55		

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	10	18:10	115	3	18	SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1022.4	13.5		Cu-Sc	4	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	14.95	34.59	50	14.04	-		
10	14.65	34.58	75	13.45	34.46		
20	14.40	34.56	100	13.25	34.55		
30	14.35	34.59					

6월 (June)

조사선 태백산 (Tae Baek San)

St. No	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	15	06:10	60			NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1004.5	16.5				
Z m	T C	S ‰	Z m	T C	S ‰		
0	18.16	34.23	30	13.28	34.41		
10	15.76	34.31	50	12.41	34.47		
20	14.65	34.34	58	12.37	-		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	15	07:40	110			NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1004.5	19.0				
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	19.75	34.30	50	-	34.30		
10	19.63	34.29	75	16.66	34.37		
20	17.77	34.36	100	14.68	34.53		
30	17.66	34.34	109	14.25	34.54		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	15	08:40	130			NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1004.0	20.0				
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	19.60	34.20	50	15.58	34.45		
10	19.40	34.17	75	14.90	34.50		
20	19.05	34.25	100	14.70	34.54		
30	17.73	34.36	125	14.20	34.53		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	15	09:40	135	3	16	SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1004.1	21.0		As	8	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	20.00	34.08	50	16.26	34.45		
10	19.58	34.14	75	15.96	34.50		
20	19.03	34.19	100	15.53	34.54		
30	17.40	34.38	125	14.91	34.52		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	15	10 : 35	130	3	17	SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1004.3	22.6		As	8	C
Z m	T C		S ‰	Z m	T C		S ‰
0	20.00		34.20	50	18.50		34.31
10	19.28		34.20	75	16.31		34.46
20	19.56		34.28	100	16.02		34.52
30	18.60		-	125	15.52		34.55

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	15	11 : 25	130	3	18	SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1004.4	23.0		Ac	7	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	20.59		34.22	50	17.21		34.51
10	20.20		34.22	75	16.71		34.51
20	19.37		34.33	100	16.20		34.54
30	19.40		34.39	125	14.91		34.56

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	15	12 : 20	130	3	19	SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	2	1003.7	23.6		Ac	7	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	20.69		34.24	50	18.78		34.51
10	20.15		34.27	75	16.38		-
20	19.58		34.39	100	14.58		34.63
30	19.45		-	125	15.20		34.64

8월 (August)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell								
01	25	05 : 50	52			SW 1	SW 1								
Wind		Baro.	Air Temp.		Cloud		Weather								
Direction	Force		Dry	Wet	Type	Amount									
SW	2	1004.2	23.2												
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	P H	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	P H
m	°C	‰	%	μg-at/L	μg-at/L	μg-at/L		m	°C	‰	%	μg-at/L	μg-at/L	μg-at/L	
0	23.98	32.39	5.11	0.25	0.95	10.53	8.20	30	17.71	33.30	5.23	0.43	0.86	9.45	8.18
10	22.79	32.35	5.11	0.54	0.38	9.99	8.25	50	8.59	34.10	4.90	0.97	0.35	12.15	8.04
20	21.18	32.76	4.84	0.36	0.89	5.94	8.20								

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	25	06 : 50	110			SW 1	SW 1
Wind		Baro.	Air Temp.		Cloud		
Direction	Force		Dry	Wet	Type	Amount	
SW	1	1006.0	23.6		Ac - Cs	7	BC
Z		T	S	Z		T	S
m		°C	‰	m		°C	‰
0		25.20	-	50		15.52	-
10		25.36	-	75		14.52	-
20		25.32	-	100		6.97	-
30		22.29	-				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell								
03	25	07 : 50	150	4	16	SW 2	SW 1								
Wind		Baro.	Air Temp.		Cloud		Weather								
Direction	Force		Dry	Wet	Type	Amount									
SW	2	1006.2	23.5		Cs	9	C								
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	PH	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	PH
0	26.23	32.36	4.73	0.22	0.08	12.15	8.27	75	15.95	34.15	4.52	0.61	0.62	-	8.20
10	26.42	32.30	5.49	0.32	0.19	10.53	8.30	100	14.67	34.39	4.33	0.72	0.41	-	8.16
20	24.96	34.05	-	-	-	-	-	125	14.62	34.41	4.25	0.72	0.19	14.85	8.20
30	24.21	34.08	4.83	0.32	-	9.45	8.30	145	7.56	34.25	5.02	0.86	0.14	20.25	8.12
50	22.49	33.98	5.05	0.32	0.57	9.45	8.26								

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	25	08 : 50	150	4	19	SW 2	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1007.2	25.8		Cs	9	C
Z m	T C		S ‰	Z m	T C		S ‰
0	26.20		-	75	16.61		-
10	26.19		-	100	15.48		-
20	26.13		-	125	14.72		-
30	25.79		-	145	9.08		-
50	23.24		-				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	25	09 : 55	135	4	18	SW 2	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1007.5	25.7		As	10	C
Z m	T C		S ‰	Z m	T C		S ‰
0	26.39		32.46	50	25.46		34.03
10	26.39		32.40	75	19.66		34.01
20	26.40		32.38	100	17.30		34.24
30	26.10		32.52	130	15.50		34.40

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	25	10 : 55	125	4	15	S 3	S 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	4	1006.5	25.8		As	7	BC
Z m	T C		S ‰	Z m	T C		S ‰
0	25.70		32.44	50	22.83		33.54
10	25.31		32.41	75	17.71		34.17
20	25.30		32.60	100	16.80		34.44
30	25.19		32.74	120	16.06		34.48

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	25	11 : 45	125	4	19	S 3	S 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	4	1006.5	26.0		As	7	BC
Z m	T C	S ‰		Z m	T C	S ‰	
0	24.91	32.54		50	20.92	33.69	
10	25.34	32.94		75	17.20	34.26	
20	22.12	33.51		100	16.70	34.42	
30	20.90	33.61		120	16.20	34.44	

10월 (October)

조사선 태백산 (Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	17	08 : 15	80	4	12	NW 2	NW 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1019.6	18.5		Ns	9	C
Z m	T C	S ‰		Z m	T C	S ‰	
0	17.46	33.17		30	12.35	33.95	
10	16.31	33.44		50	6.25	34.13	
20	15.8	33.54		75	5.32	-	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	17	07 : 5	120	4	10	NW 2	NW 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1019.4	18.8		Ns	10	C
Z m	T C	S ‰		Z m	T C	S ‰	
0	19.02	32.78		50	17.40	34.09	
10	18.95	32.75		75	14.00	34.14	
20	17.30	33.37		100	9.10	34.16	
30	17.40	33.56					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	17	06 : 40	110			NW 2	NW 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1019.5	18.7		Ns	10	C
Z m	T C	S ‰	Z m	T C	S ‰		
0	21.15	33.04	50	14.90	34.30		
10	21.09	33.01	75	13.50	34.31		
20	18.66	33.03	100	3.39	34.11		
30	15.03	33.95					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	17	06 : 05	130			NW 2	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1019.5	18.7				C
Z m	T C	S ‰	Z m	T C	S ‰		
0	21.10	33.08	50	19.08	33.57		
10	21.05	33.03	75	15.82	34.36		
20	21.70	33.01	100	15.22	34.38		
30	20.73	33.07	125	12.70	34.28		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	17	05 : 20	140			N 1	N 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	2	1019.5	18.7				C
Z m	T C	S ‰	Z m	T C	S ‰		
0	21.20	33.08	50	16.63	34.01		
10	21.20	33.05	75	14.81	34.12		
20	21.35	33.06	100	14.08	34.37		
30	20.32	33.21	125	13.30	34.19		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	17	04 : 25	90			N 1	N 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	2	1019.8	18.5				C
Z m	T °C		S ‰	Z m	T °C		S ‰
0	21.05		32.95	30	20.68		33.22
10	21.29		32.93	50	16.67		33.59
20	21.43		33.09	75	16.33		34.19

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	17	03 : 20	120			N 1	N 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	2	1019.8	18.5				
Z m	T °C		S ‰	Z m	T °C		S ‰
0	22.60		33.53	50	22.59		33.51
10	22.50		33.51	75	18.54		34.24
20	22.60		33.51	100	16.39		34.25
30	22.60		33.50	118	17.50		33.51

73년 1월(January 73)

조사선 한라산(Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	4	08 : 10	79			W 1	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	5	1029.0	2.8		C1	2	B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	13.17		34.01	30	13.96		34.00
10	13.93		34.01	50	13.90		34.00
20	13.10		34.02	75	13.25		34.06

St. No.	Date	Time	Time	Water Color.	Water Trans.	Wave	Swell
02	4	07 : 10	82			W 1	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	5	1028.5	2.7		C1	2	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	15.58	34.26	30	16.06	34.25		
10	16.13	34.24	50	15.38	34.16		
20	15.75	34.26	75	14.81	34.10		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	4	05 : 55	140			W 1	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	5	1027.7	3.1				
Z m	T C	S ‰	Z m	T C	S ‰		
0	15.50	-	50	16.99	34.42		
10	16.84	34.31	75	16.99	34.42		
20	16.95	34.31	100	-	34.29		
30	17.02	34.30	125	16.87	34.23		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	4	04 : 40	137			W 1	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	5	1027.2	3.0				
Z m	T C	S ‰	Z m	T C	S ‰		
0	14.51	34.27	50	16.53	34.26		
10	14.44	34.28	75	16.62	34.27		
20	16.64	34.30	100	16.71	34.28		
30	16.20	34.30	125	16.64	34.28		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	4	03 : 40	135			W 1	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	5	1026.0	3.0				
Z m	T °C		S ‰	Z m	T °C		S ‰
0	14.50		34.18	50	15.91		34.17
10	15.90		34.18	75	16.06		34.16
20	16.00		34.16	100	16.00		34.16
30	15.76		34.16	125	15.46		34.26

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	4	02 : 45	138			W 1	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	5	1025.5	2.5				
Z m	T °C		S ‰	Z m	T °C		S ‰
0	14.31		34.14	50	15.33		34.14
10	15.76		34.14	75	15.57		34.14
20	15.89		34.14	100	15.90		34.16
30	15.79		34.14	125	15.42		34.15

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
07	4	01 : 50	127			W 2	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	4	1024.9	2.8		Cl	6	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	14.50		34.14	50	15.93		34.14
10	15.91		34.14	75	16.00		34.13
20	15.92		34.14	100	15.95		34.16
30	15.73		34.14	125	15.96		34.14

207-2 선 해양관측 성적

OCEANOGRAPHIC DATA, LINE 207-2

2월 (February)

조사선 태백산 (Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	9	04:30	100			SEI	SEI
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1010.0	10.0				C
Z	T		S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C		‰	‰	µg-at/L	µg-at/L	µg-at/L
0	12.70		34.31	5.90	0.54	1.22	4.05
10	12.74		34.28	5.95	0.63	1.05	2.43
20	12.69		-	6.03	0.63	0.68	0.54
30	12.66		34.28	6.03	0.41	0.46	1.62
50	12.58		34.27	6.18	0.45	0.65	2.16
75	12.38		34.29	6.03	0.52	0.70	1.89
98	12.21		34.26	6.04	-	-	-

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	9	03:55	105			SEI	SEI
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1010.0	11.0				C
Z	T		S	Z	T	S	
m	°C		‰	m	°C	‰	
0	13.64		34.35	50	13.08	34.28	
10	13.64		34.35	75	12.85	34.26	
20	13.65		34.35	100	12.73	34.26	
30	13.59		34.35				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
03	15	12 : 50	210	3	13	SE 3	SE 4						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
SE	4	1029.0	9.5		Ns	10	C						
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	13.88	34.31	6.13	0.11	0.68	1.35	75	13.73	34.33	6.01	0.25	0.59	4.32
10	13.83	34.35	6.05	0.22	0.68	0.81	100	13.58	34.33	5.78	0.25	0.73	0
20	13.91	34.26	6.35	0.27	0.27	2.16	125	13.38	34.32	6.05	0.25	1.05	2.70
30	13.82	34.36	6.03	0.29	0.62	6.48	150	13.19	34.29	5.74	0.32	1.35	2.97
50	13.77	34.34	5.93	0.29	0.35	2.70	200	12.32	34.25	5.73	0.52	1.08	2.70

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	9	02 : 20	140			SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1010.0	11.0				C
Z m	T C		S ‰	Z m	T C		S ‰
0	13.90		34.34	50	13.89		34.35
10	13.94		34.35	75	13.76		34.33
20	13.89		-	100	13.52		34.31
30	13.99		34.35	125	13.40		34.36

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
05	9	01 : 20	76			SE 1	SE 1						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
SE	3	1010.0	11.0				C						
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	13.39	34.33	5.94	0.54	0.54	6.48	30	13.43	34.31	6.05	0.59	0.97	3.78
10	13.40	34.32	5.89	0.34	0.86	1.35	50	13.49	34.32	5.88	0.50	1.11	2.70
20	13.46	34.33	6.03	0.47	0.57	5.40	75	13.30	34.32	5.93	0.40	1.08	3.51

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	9	00 : 10	120			SE 1	SE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SE	3	1010.0	11.0				C
Z m	T C		S ‰	Z m	T C		S ‰
0	13.48		34.30	50	13.45		34.32
10	13.58		34.34	75	13.39		34.32
20	13.47		34.32	115	13.39		34.32
30	13.43		34.32				

4월 (April)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	11	01 : 50	75			S 2	S 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	5	1022.5	11.0				
Z m	T C		S ‰	Z m	T C		S ‰
0	12.40		34.57	30	13.80		33.71
10	12.40		34.55	50	13.70		34.14
20	13.45		33.73	70	13.63		34.34

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	11	00 : 45	110			S 2	S 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	5	1022.5	11.5				
Z m	T C		S ‰	Z m	T C		S ‰
0	14.00		34.59	50	14.45		34.60
10	14.63		34.59	75	13.50		34.59
20	14.70		34.61	100	13.28		34.57
30	14.73		34.59				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	10	23 : 45	200			S 2	S 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	5	1022.5	11.5				
Z m	T C	S ‰	Z m	T C	S ‰		
0	13.18	34.60	75	15.00	34.64		
10	14.96	34.63	100	14.75	34.64		
20	15.20	34.62	125	14.55	34.61		
30	15.17	34.61	150	14.23	34.59		
50	14.67	34.63	198	13.49	34.56		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	10	22 : 45	153			S 2	S 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	5	1022.5	11.8				
Z m	T C	S ‰	Z m	T C	S ‰		
0	14.45	34.62	75	14.70	34.61		
10	15.15	34.61	100	14.75	34.59		
20	15.20	34.59	125	14.68	34.58		
30	14.53	34.62	150	14.58	34.57		
50	14.80	34.60					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	10	21 : 35	95			SW 1	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	5	1022.3	12.5				
Z m	T C	S ‰	Z m	T C	S ‰		
0	14.80	34.59	50	14.50	34.64		
10	15.10	34.61	75	14.00	34.57		
20	14.65	34.59	90	13.80	-		
30	14.00	34.61					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	10	20 : 30	104	4	19	SW 1	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1022.6	14.2		Sc	4	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	14.48	34.57	50	14.12	34.57		
10	14.35	34.57	75	14.00	34.56		
20	14.20	34.57	100	13.78	34.55		
30	14.18	34.57					

6월 (June)

조사선 태백산 (Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	15	04 : 20	100			NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1004.0	18.2				
Z m	T C	S ‰	Z m	T C	S ‰		
0	19.54	34.31	50	14.50	34.52		
10	19.29	34.35	75	14.06	34.50		
20	15.71	34.39	98	15.45	34.50		
30	15.90	34.26					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	15	03 : 20	115			NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1004.0	18.2				
Z m	T C	S ‰	Z m	T C	S ‰		
0	18.90	34.31	50	15.74	34.40		
10	19.04	34.28	75	14.73	34.52		
20	18.90	34.28	100	13.76	34.56		
30	17.70	34.32	113	13.63	34.52		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	15	02 : 25	215			NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1004.0	18.3				
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	19.97	34.01	100	14.87	34.53		
10	19.90	34.01	125	14.75	34.51		
20	19.16	34.11	150	14.49	34.52		
30	17.90	34.27	200	12.80	34.46		
50	15.58	34.40	210	11.62	34.41		
75	14.98	34.52					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	15	01 : 35	120			NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1004.0	19.5				
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	19.09	34.04	50	18.00	34.29		
10	19.65	34.05	75	15.28	34.48		
20	19.65	34.05	100	15.25	34.50		
30	19.54	34.05	118	15.23	34.48		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	15	00 : 50	115			NE 1	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1004.0	19.5				
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	19.60	33.89	50	18.24	34.24		
10	19.60	34.04	75	16.55	34.44		
20	19.50	34.07	100	16.01	34.47		
30	18.81	34.16	113	15.92	34.09		

St. No.	Date	Time	Depth	Water Color .	Water Trans .	Wave	Swell
06	14	23 : 55	120			NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1004.0					
Z m	T C	S ‰	Z m	T C	S ‰		
0	19.80	34.22	50	16.62	34.25		
10	19.29	34.25	75	16.55	34.41		
20	19.05	34.25	100	-	34.42		
30	18.49	34.20	118	16.72	34.42		

8월 (August)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color .	Water Trans .	Wave	Swell
01	25	04 : 35	95			SW 1	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1006.7	23.2				
Z m	T C	S ‰	Z m	T C	S ‰		
0	23.50	-	50	14.42	-		
10	24.60	-	75	11.43	-		
20	23.85	-	93	6.40	-		
30	21.27	-					

St. No.	Date	Time	Depth	Water Color .	Water Trans .	Wave	Swell
02	25	02 : 55	105			SW 1	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1008.0	24.2				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	PH
0	25.40	32.69	4.92	0.31	-	6.21	8.22
10	25.70	32.63	5.02	0.32	0.41	6.21	8.20
20	25.90	32.62	4.83	0.25	0.86	7.29	8.26
30	25.68	33.94	4.83	0.18	0.49	4.59	8.22
50	19.71	33.82	4.59	0.43	0.97	12.15	8.20
75	15.21	33.99	4.88	0.22	0.14	7.56	8.20
100	15.89	34.39	4.26	0.61	0.46	9.99	8.12

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	25	01 : 40	130			SW 1	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	3	1008.3	24.7				
Z m	T C	S ‰	Z m	T C	S ‰		
0	26.15	-	50	25.65	-		
10	26.28	-	75	24.82	-		
20	26.15	-	100	19.78	-		
30	26.10	-	125	17.31	-		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	25	00 : 36	75			SW 1	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1008.7	24.8				
Z m	T C	S ‰	O ₂ %	PO ₄ -P µg-at/L	NO ₂ -N µg-at/L	SiO ₂ -Si µg-at/L	PH
0	26.40	32.34	4.71	0.23	0.30	10.53	8.10
10	26.45	32.41	4.73	0.36	0.32	7.29	8.20
20	26.55	33.61	4.83	0.45	1.35	6.21	8.22
30	26.00	33.21	4.83	0.32	0.81	7.29	8.25
50	24.63	33.76	4.73	0.23	0.73	4.05	8.20
73	16.30	32.93	4.73	0.29	0.27	5.40	8.20

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	24	23 : 55	95			SW 1	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	1	1009.5	24.9				
Z m	T C	S ‰	Z m	T C	S ‰		
0	26.39	-	30	21.64	-		
10	25.78	-	50	18.16	-		
20	26.02	-	75	16.00	-		

St. No.	Date	Time	Depth	Water Color .	Water Trans.	Wave	Swell
06	24	23 : 10	100			SW 1	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	1	1009.5	25.0				
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	PH
0	26.20	32.36	4.84	0.41	0.14	9.45	8.12
10	25.96	32.31	4.84	0.45	0.62	11.61	8.18
20	26.00	32.82	4.83	0.20	0.41	9.45	8.20
30	25.80	33.81	4.83	0.36	0.35	14.31	8.22
50	21.91	33.83	-	0.25	-	-	8.16
75	21.80	34.28	4.35	0.36	1.08	9.99	8.18
95	16.40	34.40	4.16	0.20	0.27	14.85	8.10

10월 (October)

조사선 태백산(Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	16	21:10	105			NW 1	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1019.0	19.7				
Z m	T C	S ‰	Z m	T C	S ‰		
0	18.90	32.82	50	11.05	34.06		
10	18.96	32.70	75	7.40	34.15		
20	18.28	33.04	100	5.30	34.10		
30	-	33.04					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	16	22:00	115			N 1	N 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	2	1019.8	19.5				
Z m	T C	S ‰	Z m	T C	S ‰		
0	19.25	32.70	50	13.90	33.93		
10	19.20	32.67	75	14.13	34.24		
20	17.68	33.23	100	6.65	34.13		
30	16.23	33.67					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	16	23:05	105			N 1	N 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	2	1019.8	19.0				C
Z m	T C	S ‰	Z m	T C	S ‰		
0	23.13	32.99	50	15.50	33.83		
10	21.11	32.95	75	15.20	34.39		
20	20.80	32.95	100	14.99	34.36		
30	20.11	32.85					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	16	23:50	135			N 1	N 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	2	1019.8	18.5				C
Z m	T C	S ‰	Z m	T C	S ‰		
0	20.95	33.01	50	18.30	33.26		
10	20.95	32.98	75	16.32	34.02		
20	21.33	33.00	100	14.63	34.02		
30	19.90	33.24	125	14.83	34.22		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	17	00:40	108			N 1	N 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	1	1019.8	18.5				
Z m	T C	S ‰	Z m	T C	S ‰		
0	20.73	33.00	50	20.12	33.53		
10	21.14	32.96	75	17.22	33.62		
20	21.44	33.14	100	15.71	33.79		
30	21.18	33.34					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	17	01:40	162			N 1	N 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
N	1	1019.8	18.5				
Z m	T C	S ‰	Z m	T C	S ‰		
0	22.78	33.55	50	18.50	33.68		
10	22.54	33.54	75	15.21	33.81		
20	22.50	33.54	100	15.10	34.03		
30	22.29	33.54	125	15.08	34.07		

73년 1월 (January 73)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	3	18:50	65			NW 2	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1023.5	3.8		Gi	3	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	14.02	34.02	30	13.86	33.97		
10	14.23	34.22	50	13.50	33.96		
20	14.96	34.03	75	12.49	34.09		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	3	19:40	88			NW 2	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1023.9	3.7		Gi	4	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	13.81	34.22	30	15.76	34.20		
10	15.66	34.23	50	15.60	34.17		
20	15.91	34.22	75	13.89	34.03		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	3	20:30	142			NW 2	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1024.4	3.5		Gi	4	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	16.30	34.30	75	16.66	34.30		
10	17.07	34.33	100	16.86	34.26		
20	17.15	34.30	125	16.52	34.23		
30	-	34.32	138	15.76	34.18		
50	17.11	34.30					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	3	21:25	140			NW 2	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	4	1024.6	3.2		Ci	4	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	16.07		34.28	50	16.59		34.26
10	16.59		34.27	75	16.66		34.27
20	-		34.27	100	16.62		34.27
30	16.41		34.28	125	16.15		34.24

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	3	22:45	72			NW 2	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1024.8	3.1		Ci	4	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	16.03		34.26	30	16.08		34.21
10	16.09		34.21	50	16.09		34.24
20	16.08		34.21	70	16.12		34.21

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
06	3	23:45	104			NW 2	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1024.7	3.2		Ci	6	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	14.46		34.22	50	16.23		34.21
10	16.03		34.22	75	16.00		34.17
20	16.26		34.22	100	15.88		34.15
30	16.27		34.22				

206-1 선 해 양 관 측 성 적

OCEANOGRAPHIC DATA, LINE 206-1

2 월 (February)

조 사 선 태백산 (Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	28	11:55	78	4	15	W 3	W 4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	5	1010.0	4.5		Ci	7	BC
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	
0	12.52	34.26	5.93	0.36	0.97	5.40	
10	12.52	34.25	5.85	0.31	0.27	4.05	
20	12.55	34.26	5.85	0.56	1.46	3.24	
30	12.51	34.26	5.82	0.38	1.05	4.86	
50	12.55	34.25	5.82	0.52	0.95	3.51	
75	12.57	34.28	5.83	0.58	1.76	4.05	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	7	18:00	80			SW 1	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1010.0	12.2		Ns	7	BC
Z m	T C		S ‰	Z m		T C	S ‰
0	14.08		34.37	30		12.80	34.29
10	13.85		34.37	50		12.80	34.28
20	13.39		34.31	75		12.79	34.30

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	7	18:50	110			SW 1	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	2	1010.0	12.0		Ns	7	BC
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	
0	13.11	34.36	6.23	0.72	1.08	6.48	
10	13.11	34.31	6.04	0.49	0.68	9.45	
20	13.11	34.30	5.95	0.63	0.70	2.70	
30	12.92	34.28	5.79	0.34	0.81	5.40	
50	12.67	34.28	5.93	0.61	0.70	6.75	
70	12.73	34.28	5.93	0.52	1.16	2.70	
100	12.70	34.29	5.84	0.45	0.68	4.05	

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	3	16:30	180	4	15	Nw 4	NW 4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1015.0	4.0		C1	7	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	13.49	34.33	75	13.80	34.33		
10	14.03	34.34	100	13.70	34.31		
20	14.05	34.34	125	13.43	34.29		
30	13.94	34.34	150	13.38	34.29		
50	13.80	34.33					

4 월 (April)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	11	12:10	85			SW 2	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1023.0	11.2		C1	4	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	12.80	34.29	30	13.53	34.46		
10	12.53	34.41	50	13.55	34.54		
20	13.45	34.46	75	13.08	34.52		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	11	11:00	100			SW 2	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	5	1023.0	12.5		C1	6	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	12.50	33.31	50	13.05	34.54		
10	14.35	34.49	75	12.60	34.51		
20	14.38	34.56	95	12.25	34.53		
30	13.95	-					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	11	09:45	108			S 1	S 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	3	1023.5	14.0				
Z m	T C		S ‰	Z m	T C		S ‰
0	13.50		34.58	50	14.79		34.58
10	14.89		34.60	75	14.11		34.54
20	14.90		34.59	100	14.45		34.49
30	14.62		34.56				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	11	08:40	160			S 1	S 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	3	1024.0	16.0				
Z m	T C		S ‰	Z m	T C		S ‰
0	14.03		34.59	75	14.75		34.58
10	15.00		34.61	100	14.70		34.58
20	15.01		34.59	125	14.10		34.56
30	15.00		34.60	150	12.88		34.54
50	14.90		34.61				

6 월 (June)

조사선 태백산 (Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	14	17:15	80	4	12	NE 1	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1004.0	21.0	19.4	Ac	4	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	19.31		34.30	30	16.60		34.39
10	18.22		34.26	50	15.20		34.39
20	17.39		34.29	75	14.71		34.47

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	14	16:30	90	4	12	NE 1	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1005.0	20.8	19.4	Ac	2	B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	19.70		34.29	50	16.85		34.38
10	19.68		34.27	75	14.73		34.48
20	19.50		34.28	88	14.65		34.51
30	18.74		34.30				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	14	15:35	110	4	20	NE 1	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1005.0	21.0	19.4	Ac	2	B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	19.45		34.18	50	16.50		34.34
10	19.32		34.17	75	16.02		34.35
20	19.50		34.18	100	14.68		34.51
30	19.10		34.17				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	14	14:35	190	4	20	NE 1	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	4	1004.6	19.2	20.6	Ac	1	B
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	20.10	33.90	75	15.90	34.34		
10	19.56	33.99	100	15.10	34.53		
20	19.19	34.14	125	15.08	34.55		
30	17.71	34.27	150	15.04	34.54		
50	16.75	34.29	188	15.01	34.56		

8월 (August)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	18	02:10	80				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	26.92	32.29	30	16.10	33.86		
10	23.92	32.51	50	14.50	34.31		
20	20.66	33.08	75	10.60	34.25		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	18	23:20	87				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	PH
0	26.98	32.14	4.83	0.49	-	14.31	8.20
10	25.45	33.58	5.02	0.38	0.35	10.26	8.25
20	22.70	33.87	5.37	0.09	0.22	12.42	8.22
30	19.38	33.36	5.02	0.43	1.78	15.12	8.22
50	16.50	33.75	5.02	0.54	0.95	9.45	8.15
75	14.73	34.30	4.35	0.74	0.57	10.26	8.04
86	14.10	34.32	4.26	0.68	0.46	12.15	8.05

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	18	04:30	108				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
Z m	T C	S ‰	Z m	T C	S ‰		
0	26.90	32.08	50	19.46	33.95		
10	25.82	32.03	75	15.65	34.23		
20	23.65	32.63	100	14.61	34.32		
30	22.25	33.74					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	18	06:40	180				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	PH
0	27.60	32.58	4.84	0.27	0.30	8.91	8.26
10	27.10	32.61	4.83	0.13	0.27	7.56	8.25
20	25.80	33.19	4.92	0.14	0.24	7.83	8.20
30	25.00	33.79	5.02	0.18	1.16	21.06	8.22
50	23.80	33.16	4.90	0.43	0.27	13.23	8.27
75	16.47	34.00	4.92	0.49	-	10.80	8.10
100	14.53	34.30	4.35	0.54	1.35	14.31	8.06
125	14.60	34.35	4.35	0.59	0.62	13.50	8.04
150	4.45	34.10	5.41	1.67	0.54	22.68	8.00
178	3.70	34.06	5.60	1.58	0.41	-	7.96

10월 (October)

조사선 태백산(Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	15	12:45	55	4	12	S 1	S 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	4	1010.5	21.4		As	7	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	19.29	32.93	30	16.33	33.46		
10	18.76	33.12	50	14.83	34.06		
20	17.40	33.40					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	16	12:50	50	4	12	NW 1	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1017.5	21.6		As	4	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	18.75	32.86	30	14.65	33.02		
10	18.78	32.85	48	15.03	33.48		
20	16.85	33.64					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	16	13:40	63	4	12	NW 1	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1017.5	21.7		As	4	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	18.80	33.04	30	18.15	33.23		
10	18.78	33.03	50	16.45	33.59		
20	18.75	33.03	60	13.99	33.98		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	16	14:40	175	3	17	NW 1	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	2	1017.4	22.0		As	3	BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	22.84	33.45	75	14.63	34.04		
10	22.83	33.44	100	14.19	34.09		
20	22.85	33.31	125	14.20	34.17		
30	22.60	33.41	150	3.53	34.07		
50	18.18	33.34	170	3.47	34.07		

12월(December)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	31	21:20	83			NW 2	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1023.5	6.2		Ac, Ci	10	C
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	14.86	34.11	30	15.16	34.11		
10	15.09	34.12	50	14.78	34.01		
20	15.12	34.12	75	14.62	34.06		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	31	20:25	91			NW 2	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1023.2	6.5		Ac, Ci	8	C
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	16.80	34.17	50	-	34.04		
10	-	34.18	75	15.33	34.17		
20	15.25	34.17	88	15.35	34.15		
30	15.32	34.04					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	31	19:45	94			W 2	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1023.0	6.2		Ac, Ci	8	C
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	17.00	34.19	50	15.85	34.10		
10	16.39	34.23	75	15.35	34.08		
20	15.92	34.13	90	15.13	34.07		
30	15.90	34.10					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	31	18:55	206			W 2	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	5	1022.5	7.6				
Z m	T C	S ‰	Z m	T C	S ‰		
0	16.10	34.30	75	15.10	34.02		
10	17.54	34.34	100	14.74	34.00		
20	17.43	34.29	150	14.81	34.24		
30	16.96	34.24	200	10.90	34.02		
50	15.51	34.03					

206-2 선 해 양 관 측 성 적
OCEANOGRAPHIC DATA, LINE 206-2

2월 (February)

조사선 태백산(Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	28	13:30	70	4	15	W 3	W 4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	5	1010.0	4.6		Cl	7	BC
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	12.27	34.21	30	12.08	34.21		
10	12.12	34.22	50	12.07	34.03		
20	12.08	34.28	65	12.13	34.21		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
02	28	14:20	88	4	13	W 3	W 4						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
W	5	1010.0	4.7		Cl	7	BC						
Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	Z m	T C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L
0	13.01	34.28	5.83	0.86	0.89	5.40	30	12.95	34.26	5.75	0.45	1.84	11.07
10	12.99	34.26	5.75	0.65	0.95	2.97	50	12.60	34.28	5.73	0.32	0.41	7.29
20	13.00	34.27	5.78	0.83	1.16	2.97	75	12.60	34.21	5.78	0.41	1.22	5.67

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	28	15:20	100	4	12	W 3	W 4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	5	1010.0	5.2		Cl	7	BC
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	-	34.25	50	12.89	34.22		
10	12.82	34.30	75	12.84	34.22		
20	12.85	34.22	98	12.83	34.22		
30	12.83	34.22					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell						
04	28	16200	148	4	13	W 3	W 4						
Wind		Baro.	Air Temp.		Cloud		Weather						
Direction	Force		Dry	Wet	Type	Amount							
W	5	1011.0	5.7		Ci	7	BC						
Z	T	S	O ₂	PC ₄ -P	NO ₂ -N	SiO ₂ -Si	Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si
m	°C	‰	%	μg-at/L	μg-at/L	μg-at/L	m	°C	‰	%	μg-at/L	μg-at/L	μg-at/L
0	12.93	34.29	6.08	0.54	0.54	4.59	50	13.07	34.28	5.83	0.58	1.27	8.64
10	13.08	-	-	-	-	-	75	12.93	34.24	5.92	0.70	1.30	6.75
20	13.16	-	-	-	-	-	100	12.95	34.26	5.70	0.52	0.57	9.99
30	13.02	34.26	6.06	0.54	0.43	3.24	145	12.91	34.23	5.73	0.52	0.59	-

3 월 (March)

조사선 대백산 (Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	3	14:20	135	4	16	NW 4	NW 4
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	5	1015.0	4.0		Ci	7	BC

Z	T	S	Z	T	S
m	°C	‰	m	°C	‰
0	13.86	34.33	50	13.90	34.35
10	14.00	34.34	75	13.90	34.34
20	13.91	34.34	100	13.95	34.35
30	13.84	34.36	125	13.89	34.33

4 월 (April)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	11	14:00	67	5		SW 2	SW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1023.5	14.0		Ci	3	BC
Z m		T C	S ‰	Z m	T C	S ‰	
0		13.03	32.40	30	13.57	34.39	
10		12.75	32.88	50	13.46	34.37	
20		13.50	34.37	65	13.53	34.46	

St. No.	Date	Time	Depth	Water Color .	Water Trans.	Wave	Swell
02	11	15:05	85	5	11	S 2	S 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
S	5	1025.0	14.2		C1	3	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	13.22		34.22	30	13.59		34.53
10	13.44		34.30	50	13.59		34.51
20	13.52		34.47	75	13.62		34.81

St. No.	Date	Time	Depth	Water Color .	Water Trans.	Wave	Swell
03	11	16:15	100				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	4	1023.0	14.8			3	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	14.40		34.59	50	13.55		34.58
10	14.54		34.57	75	13.50		34.56
20	14.39		34.57	95	12.18		34.56
30	14.40		34.43				

St. No.	Date	Time	Depth	Water Color .	Water Trans.	Wave	Swell
04	11	17:33	125	4	18		
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	5	1024.5	15.0			3	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	14.95		34.60	50	14.22		34.58
10	14.92		34.59	75	14.40		34.54
20	14.18		34.61	100	12.32		34.49
30	14.56		34.58	120	12.25		34.47

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	11	18:40	127	4	20		
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
SW	5	1024.5	14.8				BC
Z m	T C	S ‰	Z m	T C	S ‰		
0	15.50	34.66	50	15.10	34.59		
10	15.12	-	75	14.44	34.58		
20	15.38	34.63	100	12.80	34.53		
30	15.11	34.67	125	12.38	34.49		

6월 (June)

조사선 태백산 (Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	14	09:10	88	5	5	NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1005.5	19.3	19.0	Ac	1	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	17.50	34.32	30	16.00	34.32		
10	16.57	34.32	50	15.71	34.37		
20	16.28	34.30	65	14.86	34.48		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	14	10:05	87	4	11	NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1005.4	22.2		Ac	1	B
Z m	T C	S ‰	Z m	T C	S ‰		
0	19.90	34.33	50	15.61	34.40		
10	18.28	34.33	75	14.92	34.46		
20	17.52	34.36	85	14.55	34.48		
30	16.66	34.40					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	14	11:00	90	4	16	NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1005.0	21.4	20.0	Ac	1	B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	19.40		34.25	50	15.58		34.41
10	19.00		34.25	75	14.70		34.53
20	18.85		-	88	14.75		34.54
30	17.00		34.35				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	14	12:00	140	3	23	NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1005.4	21.2	19.8	Ac	1	B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	20.38		33.69	75	16.38		34.26
10	20.30		33.70	100	14.81		34.54
20	18.98		34.23	125	14.78		34.58
30	18.06		34.31	135	14.84		34.56
50	17.43		34.28				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	14	13:05	140	3	20	NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1005.4	21.2	20.2	Ac	2	B
Z m	T °C		S ‰	Z m	T °C		S ‰
0	20.38		33.51	75	16.90		34.47
10	19.85		33.55	100	16.49		34.49
20	19.48		33.83	125	15.41		34.47
30	-		33.88	138	14.84		34.54
50	19.33		34.45				

8월 (August)

조사선 지리산 (Chi Ri San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	18	00:30	76				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	PH
m	°C	‰	%	µg-at/L	µg-at/L	µg-at/L	
0	25.80	-	5.02	0.45	0.27	12.42	8.20
10	22.95	32.85	5.39	0.32	0.14	8.10	8.20
20	21.35	33.01	5.25	0.09	0.32	20.52	8.20
30	17.77	33.58	4.83	0.81	0.27	10.53	8.20
50	14.65	34.25	4.54	0.86	1.73	16.20	8.20
75	11.50	34.28	4.49	0.81	0.27	12.42	8.12

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	17	23:20	86				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	27.00	32.40	30	17.73	33.70		
10	23.07	32.70	50	14.69	34.28		
20	19.78	33.43	80	14.51	34.34		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	17	22:05	96				
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
Z	T	S	O ₂	PO ₄ -P	NO ₂ -N	SiO ₂ -Si	PH
m	°C	‰	%	µg-at/L	µg-at/L	µg-at/L	
0	27.36	32.11	4.86	-	-	-	-
10	26.21	32.13	5.02	0.27	0.32	10.26	8.28
20	23.20	32.72	5.20	0.23	0.24	7.02	8.30
30	20.60	33.16	5.22	0.32	0.62	10.80	8.25
50	18.10	33.66	4.71	0.56	2.21	10.26	8.25
75	15.67	33.87	4.64	0.68	1.35	9.18	8.22
90	14.50	34.34	4.37	0.59	-	19.98	8.20

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	17	20:45	105			E 1	E 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
E	1	1014.5	30.3		Cs	8	C
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	27.29	32.11	50	20.45	33.71		
10	25.83	31.95	75	17.66	34.13		
20	24.74	32.21	100	14.50	34.33		
30	24.40	32.64					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	17	18:35	120	4	23	NE 1	NE 2
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	1	1014.5	30.3		Cc	6	BC
Z m	T °C	S ‰	O ₂ %	PO ₄ -P μg-at/L	NO ₂ -N μg-at/L	SiO ₂ -Si μg-at/L	PH
0	27.80	32.01	4.84	0.20	0.32	12.15	8.32
10	26.13	31.97	5.11	0.13	0.19	10.53	8.35
20	25.56	32.64	5.03	0.18	0.41	11.07	8.35
30	23.53	33.82	5.13	0.25	0.22	11.61	8.38
50	20.83	34.24	4.64	0.52	-	10.80	8.32
75	17.14	34.26	4.77	0.81	-	9.45	8.10
100	14.53	34.33	4.26	-	-	-	-
115	14.44	34.37	4.35	0.72	0.54	17.01	8.16

10월 (October)

조사선 태백산 (Tae Baek San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	15	11:40	75	4	15	NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1025.0	20.5		As	8	C
Z m	T °C	S ‰	Z m	T °C	S ‰		
0	18.35	33.24	30	15.20	34.04		
10	17.10	33.58	50	14.50	34.12		
20	15.90	33.88	70	10.85	-		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
02	15	10:50	90	4	12	NE 2	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	3	1014.5	20.2		As	8	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	19.35	32.79	30	14.17	34.01		
10	18.45	33.14	50	14.05	34.48		
20	16.20	33.70	75	9.83	34.13		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	15	10:00	110	4	12	NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1014.5	20.2		As	9	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	19.09	32.91	50	14.60	33.98		
10	—	33.47	75	13.93	33.97		
20	18.85	33.39	100	8.38	34.15		
30	17.02	33.60					

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	15	09:10	145	4	10	NE 1	NE 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NE	2	1014.5	20.1		Ns	10	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	21.00	33.06	50	16.30	33.65		
10	21.95	33.03	75	14.69	34.13		
20	19.55	32.91	100	14.85	34.53		
30	18.42	33.09	125	5.55	34.20		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell	
05	15	09:15	130	4	10	NE 1	NE 1	
Wind		Baro.	Air Temp.		Cloud		Weather	
Direction	Force		Dry	Wet	Type	Amount		
NE	2	1014.5	19.0		Ns	10	R	
Z m	T °C		S ‰		Z m	T °C		S ‰
0	22.80		33.25		50	16.43		33.64
10	22.73		33.26		75	15.20		34.30
20	22.00		33.14		100	15.08		34.32
30	19.35		33.02		125	14.85		34.36

12월 (December)

조사선 한라산 (Han Ra San)

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
01	31	14:07	62	5	5	NW 2	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
NW	3	1025.0	8.3		ci	4	BC
Z m	T °C		S ‰	Z m	T °C		S ‰
0	15.48		34.07	30	14.70		34.06
10	15.48		34.08	50	14.62		34.03
20	15.76		33.99				

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell	
02	31	14:45	70	5	8	NW 2	NW 1	
Wind		Baro.	Air Temp.		Cloud		Weather	
Direction	Force		Dry	Wet	Type	Amount		
NW	3	1025.2	9.6		C1	2	B	
Z m	T °C		S ‰		Z m	T °C		S ‰
0	16.83		34.22		30	16.38		34.17
10	16.82		34.23		50	15.40		34.04
20	16.49		34.18		68	14.64		34.01

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
03	31	15:40	87	4	18	NW 2	NW 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Dry	Amount	
NW	3	1023.2	10.2		Ac, Ci	7	BC
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	17.10	34.30	30	17.09	34.28		
10	17.18	34.26	50	16.91	34.30		
20	17.08	34.27	75	16.36	34.31		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
04	31	16:25	128	4	19	W 2	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	3	1022.8	9.2		Ac, Ci	10	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	17.13	34.30	50	17.22	34.31		
10	17.19	34.32	75	17.06	34.28		
20	17.17	34.31	100	16.28	34.24		
30	17.23	34.34	125	13.41	34.06		

St. No.	Date	Time	Depth	Water Color.	Water Trans.	Wave	Swell
05	31	17:20	102			W 2	W 1
Wind		Baro.	Air Temp.		Cloud		Weather
Direction	Force		Dry	Wet	Type	Amount	
W	5	1022.5	8.5		Ac, Ci	10	C
Z	T	S	Z	T	S		
m	°C	‰	m	°C	‰		
0	17.20	34.30	50	17.15	34.32		
10	17.17	34.32	75	15.50	34.05		
20	17.75	34.32	100	14.99	33.99		
30	17.75	34.31					

제 5 편

부 유 생 물 조 사 성 적



PART 5

PLANKTON DATA

1972



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부유생물의 채집 및 조사방법

부유생물의 채집은 본원 및 각 지원에서 한국근해의 정선 해양관측점과 기타 해양조사시 일반 해양관측과 동시에 채집하였으며, 그 결과는 다음표와 같다.

1. 채집 및 방법

채집망은 Norpac Net를 사용하여 정량조사 하였으며 채집수층은 수심이 깊은 중해층은 150 m에서 표면까지, 수심이 얇은 서해 및 남해의 150 m미만인 곳은 저층에서 표면까지 약 1 m/sec의 속도로서 수직 채집하여 약 5%의 중성 흐름으로 고정하였다.

2. 채집된 시료의 처리방법

상기와 같이 채집한 시료에 대해서 대형인 갑각류, 갑각류 및 피낭류등을 제거하고 용적 측정법에 의한 침전량과 중량측정법에 따른 습중량을 측정하여 그 양을 표시하였다.

정량측정후 대형 Plankton 즉 Amphipoda, Euphausiacea, Chaetognatha 및 Thaliacea 등을 Sorting 하였고 종류별 출현 및 Plankton에 관한 상세한 연구는 연구보고서에 기술키로 한다.

PLANKTON COLLECTION AND PROCEDURES

Plankton Samples Were Collected at the hydrographic stations of the sectional lines made in the adjacent water of Korea, the important fishing ground observation and special oceanographic observation.

The methods applied for collecting and treating the samples and the grears are as follow;

1. Method of Plankton Collection

Plankton samples were collected by the vertical haul with the Norpac Net. general depth of haul is from an estimated of 150 or 50 meters to the surface, and the speed of hauling is approximately one meter per second. The samples obtained from the net were immediately perserved in about five percent neutral formalin in the preserving bottle of plankton and taken to the laboratory for examinations.

2. Laboratory procedures

For quantitative examination of plankton, the settling volume and the wet weight measurements were in removing macroplanktons, such as Hydromedusae, Scyphomedusae and Doliolum. Then, the macroplanktons in samples were sorted into the groups, such as Amphipoda, Euphausiacea, Chaetognatha and Thaliacea.

동 해 부 유 생 물 조 사 성 적

PLANKTON DATA
EASTERN WATERS

1972



107선 부유생물 조사표
Plankton Data, Line 107

Month	Apr.						Jun.					
Station	01	02	03	04	05	07	01	02	03	04	05	07
Date	10	10	10	10	10	10	10	10	10	10	10	10
Time	0720	0800	0915	1105	1323	1520	0620	0715	0855	1050	1315	1725
Col. depth (m)	50	150	150	150	150	150	45	150	150	150	150	150
Volume (cc)	0.01	1.5	1.0	5.0	8.0	10.0	0.7	3.1	3.0	3.2	2.0	1.5
Biomass (mg/m3)	1.25	14.68	5.03	50.75	45.30	20.20	25.17	20.97	44.04	41.94	20.97	5.03

Month	Aug.						Oct.					
Station	01	02	03	04	05	07	01	02	03	04	05	07
Date	8	8	8	8	8	8	25	25	25	25	25	25
Time	1020	1105	1230	1430	1705	2200	1010	1300	1410	1600	1825	2350
Col. depth (m)	50	150	150	150	150	150	50	150	150	150	150	150
Volume (cc)	1.3	5.0	4.0	3.0	2.0	7.0	3.0	18.0	9.0	10.0	4.0	8.0
Biomass (mg/m3)	31.45	5453	23901	13423	18.88	41.95	78.62	29.36	40.26	56.63	41.95	98.57

Month	Dec.					
Station	01	02	03	04	05	07
Date	15	15	15	15	15	15
Time	1027	1110	1217	1340	1616	1217
Col. depth (m)	50	150	150	150	150	150
Volume (cc)	1.0	9.0	9.0	3.0	0.1	0.2
Biomass (mg/m3)	62.89	79.70	159.40	96.48	12.58	8.39

106선 부유생물 조사표
Plankton Data, Line 106

Month	Apr.							Jun.					
Station	02	03	04	05	07	09	11	02	03	04	05	09	11
Date	11	11	12	12	12	12	13	13	13	13	13	13	14
Time	1045	1148	1247	1100	1600	1845	0140	0830	1010	1130	1410	2345	0425
Col. depth (m)	50	150	150	150	150	150	150	50	150	150	150	150	150
Volume (cc)	4.2	2.0	5.5	5.5	3.0	3.3	9.5	4.0	1.2	5.0	3.2	1.0	4.0
Biomass (mg/m3)	10314	2307	5285	5578	2978	4656	9102	1886	13.00	5672	8.39	5034	71.34

Month	Aug.						Oct.						
Station	02	03	04	05	09	11	02	03	04	05	07	09	11
Date	22	22	22	22	9	9	18	18	18	17	17	17	15
Time	1000	1130	1325	1542	1100	0607	1055	1216	1315	0925	1526	1100	0442
Col. depth (m)	30	150	150	150	150	150	50	150	150	150	150	150	150
Volume (cc)	40	9.0	3.0	3.0	5.0	2.0	1.7	10.0	6.5	5.0	1.2	2.0	3.5
Biomass (mg/m ³)		121.64	4.19	50.34	54.53	23.07	69.18	163.60	94.38	94.38	142.62	41.95	54.53

Month	Dec.						
Station	02	03	04	05	07	09	11
Date	11	11	11	10	9	9	9
Time	1017	1116	1156	2300	1802	1305	0826
Col. depth (m)	30	150	150	150	150	150	150
Volume (cc)	2.0	5.0	7.0	8.0	0.8	3.0	6.0
Biomass (mg/m ³)	104.62	83.89	88.09	121.64	16.78	33.56	838.93

105선 부유생물 조사표
Plankton Data, Line 105

Month	Apr.			Jun.				
Station	07	09	11	01	03	05	07	09
Date	14	13	13	14	16	15	15	15
Time	1325	0930	0425	0810	0810	1750	1300	0825
Col. depth (m)	150	150	150	150	150	150	150	150
Volume (cc)	4.5	0.2	3.5	7.0	2.1	1.2	0.7	1.1
Biomass (mg/m ³)	65.85	4.19	36.49	176.17	5.00	28.52	7.55	62.92

Month	Aug.					Dec.					
Station	04	05	07	09	11	03	04	05	07	09	11
Date	2	2	1	1	1	5	5	5	5	5	6
Time	0155	0030	1720	1330	0715	1235	1330	1424	1850	2342	0450
Col.depth (m)	100	150	150	150	150	50	150	150	150	150	150
Volume (cc)	7.0	6.0	7.0	5.5	4.0	0.5	1.0	3.0	3.5		4.0
Biomass(mg/m ³)	150.94	100.67	132.53	67.11	20.97	38.74	54.53	71.31	4.95		41.95

104 선 부유생물 조사표
Plankton Data, Line 104

Month	Feb.				Apr.		
Station	04	05	09	11	04	09	11
Date	15	15	15	15	26	26	26
Time	0010	2250	1440	0950	2110	1040	0710
Col. depth (m)	100	150	150	150	110	150	150
Volume (cc)	4.0	1.0	0.5	1.5	3.5	7.0	13.0
Biomass (mg/m ³)	38.99	28.94	5.87	13.42	28.58	27.68	56.20

Month	Jun.					Aug.			
Station	04	05	07	09	11	05	07	09	11
Date	8	8	9	9	9	30	30	30	29
Time	2040	2140	0210	0635	1140	0515	0240	0040	2005
Col. depth (m)	100	150	150	150	150	150	150	150	150
Volume (cc)	4.0	2.0	5.0	4.2	3.6	10.0	8.0	5.0	14.0
Biomass (mg/m ³)	44.03	13.40	33.56	33.95	24.75	57.88	36.17	38.59	82.21

Month	Oct.					Dec.			
Station	04	05	07	09	11	04	05	07	09
Date	26	26	27	27	27	11	11	11	11
Time	2110	2155	0100	0520	0930	0650	0550	0255	2355
Col. depth (m)	100	150	150	150	150	100	150	150	150
Volume (cc)	11.0	8.0	6.0	6.0	4.0	3.0	5.0	2.6	6.0
Biomass (mg/m ³)	118.24	37.75	37.33	31.46	26.85	38.99	40.90	27.68	41.11

103 선 부유생물 조사표
Plankton Data, Line 103

Month	Feb.				Apr.				
Station	04	05	07	11	04	05	07	09	11
Date	18	18	18	19	25	25	25	25	26
Time	1050	1220	1610	0150	1115	1230	1615	2140	0300
Col. depth (m)	100	150	150	150	100	150	150	150	150
Volume (cc)	0.4	1.0	1.5	1.5	2.0	5.0	4.0	7.5	15.0
Biomass (mg/m ³)	13.83	15.10	17.19	39.34	40.25	42.78	33.55	77.18	85.78

Month	Jun.					Aug.				
Station	04	05	07	09	11	04	05	07	09	11
Date	10	10	10	9	9	29	29	29	29	29
Time	0740	0620	0020	2120	1555	0740	0830	1145	1520	1845
Col. depth (m)	60	150	150	150	150	100	100	150	150	150
Volume (cc)	12.0	2.0	2.2	3.0	1.0	4.0	8.0	4.2	5.0	1.5
Biomass (mg/m ³)	251.57	26.00	36.07	30.20	9.23	41.50	71.06	50.33	24.74	3.78

Month	Oct.					Dec.				
Station	04	05	07	09	11	04	05	07	09	11
Date	27	27	27	27	27	10	10	10	10	10
Time	2300	2210	1940	1635	1240	1010	1055	1340	1630	1910
Col. depth (m)	100	150	150	150	150	119	150	150	150	150
Volume (cc)	4.0	8.0	5.0	5.0	1.0	4.8	3.0	3.8	2.6	4.0
Biomass (mg/m ³)	81.13	75.92	49.50	35.23	7.55	49.17	20.55	34.82	18.04	34.82

102선 부유생물 조사서
Plankton Data, Line 102

Month	Feb.				Apr.				
Station	04	05	09	11	04	05	07	09	11
Date	19	19	19	19	25	25	25	24	24
Time	1840	1710	0950	0450	0710	0550	0145	2110	1640
Col. depth (m)	150	150	150	150	52	150	150	150	150
Volume (cc)	0.2	0.3	1.0	5.0	2.5	0.2	10.0	4.5	6.0
Biomass (mg/m ³)	8.38	10.06	18.03	64.59	84.64	25.16	70.46	21.39	45.30

Month	Jun.					Aug.				
Station	04	05	07	09	11	04	05	07	09	11
Date	10	10	10	10	11	28	28	28	27	27
Time	1000	1220	1610	2140	0300	1230	1350	0240	2240	1910
Col. depth (m)	50	150	150	150	150	50	150	150	150	150
Volume (cc)	3.0	2.1	5.0	3.5	5.0	7.8	8.0	6.5	8.0	6.0
Biomass(mg/m ²)	176.10	30.62	39.01	51.59	33.56	155.97	37.33	25.58	44.46	35.23

Month	Oct.					Dec.				
Station	04	05	07	09	11	04	05	07	09	11
Date	29	29	29	29	29	9	9	9	8	8
Time	0915	1000	1215	1620	1915	0730	0640	0230	2340	2040
Col. depth (m)	50	150	150	150	150	52	150	150	150	150
Volume (cc)	3.0	5.5	6.0	3.5	5.2	2.5	3.0	4.0	7.0	5.0
Biomass(mg/m ²)	77.99	49.50	31.87	20.55	28.52	55.60	27.27	34.40	38.17	33.56



남 해 부 유 생 물 조 사 성 적

PLANKTON DATA
SOUTHERN WATERS

1 9 7 2



209 선 부유생물 조사표
Plankton Data, Line 209

Month	Feb.					Apr.				
Station	04	05	07	09	11	04	05	07	09	11
Date	20	20	20	22	22	23	23	24	24	24
Time	1550	1650	2020	2205	0150	2020	2130	0055	0515	1030
Col.depth (m)	50	150	150	150	100	58	150	150	150	140
Volume (cc)	0.1	0.5	1.0	3.0	0.8	2.6	6.0	10.0	6.0	4.8
Biomass(mg/m ³)	11.55	9.22	14.26	47.39	33.33	47.72	38.59	33.55	43.30	147.41

Month	Jun.					Aug.				
Station	04	05	07	09	11	04	05	07	09	11
Date	13	13	11	11	11	24	24	27	27	27
Time	0600	0710	1910	1430	0930	0755	0620	1115	1510	1700
Col.depth (m)	65	140	150	140	150	150	60	150	150	150
Volume (cc)	5.0	15.0	1.2	24.0	2.5	5.0	3.0	6.0	5.0	3.0
Biomass(mg/m ³)	109.39	172.58	13.42	122.24	28.10	25.58	42.98	31.04	22.65	16.78

Month	Oct.					Dec.				
Station	04	05	07	09	11	04	05	07	09	11
Date	30	30	30	30	29	8	8	8	8	8
Time	0905	0800	0500	0140	2210	0955	1045	1310	1555	2000
Col.depth (m)	50	150	150	150	100	64	150	150	150	140
Volume (cc)	0.5	3.5	5.0	11.0	5.0	1.1	1.3	2.1	2.5	3.2
Biomass(mg/m ³)	5.03	24.75	31.04	52.01	30.82	8.85	2.94	12.16	18.46	26.07

208 선 부유생물 조사표

Plankton Data, Line 208

Month	Feb.					Apr.				
Station	01	03	05	07	09	01	03	05	07	09
Date	23	23	23	23	23	22	22	23	23	23
Time	1910	1605	1305	1010	0705	1910	2240	0110	0435	0745
Col. depth (m)	70	150	150	100	100	70	150	135	130	130
Volume (cc)	0.1	1.0	0.8	1.5	1.5	2.0	1.5	7.0	8.0	10.0
Biomass (mg/m ³)	11.68	2.93	9.22	22.01	30.18	39.53	20.55	20.03	23.22	31.93

Month	Jun.					Aug.				
Station	01	03	05	07	09	01	03	05	07	09
Date	14	14	14	14	13	23	23	23	23	23
Time	1342	1030	0700	0330	2400	1205	1505	1815	1920	2205
Col. depth (m)	70	150	140	130	130	70	150	140	130	130
Volume (cc)	1.5	2.2	2.0	12.0	4.3	2.0	7.0	3.0	7.5	11.0
Biomass (mg/m ³)	29.65	30.62	21.58	105.95	43.54	20.96	36.49	27.42	59.50	52.25

Month	Oct.					Dec.				
Station	01	03	05	07	09	01	03	05	07	09
Date	31	31	31	31	31	7	7	7	7	7
Time	0020	2240	2040	1840	1700	1130	1410	1620	1845	2030
Col. depth (m)	50	150	100	100	100	70	150	140	130	130
Volume (cc)	6.0	3.0	6.5	5.5	3.5	3.0	4.5	4.0	3.2	3.7
Biomass (mg/m ³)	100.63	11.33	47.17	59.11	35.85	41.33	12.53	17.53	27.09	23.22

207선 부유생물 조사표

Plankton Data, Line 104

Month	Feb.			Apr.			
Station	01	04	05	01	03	04	05
Date	11	11	11	11	11	11	11
Time	1035	1310	1430	0330	0520	0615	0700
Col. depth(m)	84	150	128	80	100	200	180
Volume(cc)	0.3	1.5	0.3	1.5	8.0	8.0	5.0
Biomass (mg/m ³)	6.74	18.88	4.42	49.53	96.60	41.37	31.63

Month	Aug.				Oct.		
Station	01	03	04	05	01	04	05
Date	24	24	24	24	16	16	16
Time	1645	1900	1955	2045	1950	1720	1647
Col. depth(m)	85	110	210	100	85	220	150
Volume(cc)	3.0	6.5	4.0	6.5	19.0	12.0	4.0
Biomass (mg/m ³)	49.59	57.18	25.46	52.83	384.16	54.62	11.95

Month	Dec.		
Station	01	03	05
Date	25	25	25
Time	2045	1920	1720
Col. depth(m)	83	110	128
Volume(cc)	1.0	5.5	4.0
Biomass (mg/m ³)	31.46	72.04	49.39

206선 부유생물 조사표

Plankton Data, Line 206

Month	Feb.			Apr.			Jun.		
Station	01	03	05	01	03	05	01	03	05
Date	12	12	11	12	12	11	12	12	12
Time	0355			0417	0140	2040	0725	0935	1330
Col.depth(m)	58	80	120	60	90	125	60	60	130
Volume(cc)	0.5	1.2	1.2	1.5	8.0	6.5	2.0	1.5	4.5
Biomass(mg/m ³)	34.71	38.52	21.49	82.81	118.45	63.16	32.49	42.98	66.52

Month	Aug.	Oct.			Dec.		
Station	01	01	03	05	01	03	05
Date	17	14	15	15	25	25	25
Time	1020	0210	0425	0720	0628	0915	1150
Col.depth(m)	60	65	95	125	45	80	100
Volume(cc)	2.5	15.0	9.0	0.5	4.0	4.5	3.0
Biomass(mg/m ³)	94.34	305.91	95.36	2.01	324.48	95.13	56.60

205선 부유생물 조사표

Plankton Data, Line 205

Month	Feb.	Apr.			Jun.		
Station	01	01	04	05	01	02	05
Date	12	13	12	12	11	11	11
Time	1930	0230	2150	1950	0545	0800	1130
Col.depth(m)	50	54	88	108	54	55	100
Volume(cc)	0.2	2.0	5.5	10.0	5.0	2.0	3.0
Biomass(mg/m ³)	12.58	45.45	78.63	103.38	113.05	38.90	25.16

Month	Aug.		Oct.				Dec.		
Station	03	05	01	03	04	05	01	03	05
Date	16	16	14	14	14	14	21	21	21
Time	1320	1720	0825	1150	1330	1500	1320	1550	2050
Col.depth(m)	80	150	50	85	75	80	54	80	108
Volume(cc)	0.1	2.0	12.0	6.0	4.0	9.0	1.0	3.0	1.5
Biomass(mg/m ³)	1.57	27.27	543.40	75.50	81.34	132.86	28.55	57.39	25.04

204 선 부유생물 조사표

Plankton Data, Line 204

Month	Feb.	Apr.				Jun.	
Station	04	02	03	04	06	03	06
Date	13	13	13	13	13	11	10
Time	0100	0500	0630	0840	1150	0303	2230
Col. depth (m)	80	35	50	150	100	45	100
Volume (cc)	0.3	1.0	0.4	1.0	1.5	14.0	6.5
Biomass (mg/m ³)	8.25	22.48	21.38	3.78	15.72	408.39	94.34

Month	Aug.				Oct.				
Station	02	03	04	06	02	03	04	05	06
Date	16	15	15	15	14	14	14	14	13
Time	0800	1140	0925	0610	0540	0430	0230	0110	2400
Col. depth (m)	30	50	80	120	20	50	80	90	105
Volume (cc)	0.8	0.8	0.5	7.0	2.5	5.0	5.0	4.0	7.0
Biomass (mg/m ³)	49.27	34.59	17.30	74.43	110.06	153.46	112.42	61.50	97.66

Month	Dec.			
Station	02	03	04	06
Date	9	9	9	11
Time	1045	1220	1432	0735
Col. depth (m)	30	58	80	90
Volume (cc)	3.0	3.5	5.5	5.0
Biomass (mg/m ³)	119.90	66.16	91.20	70.58

203 선 부유생물 조사표
Plankton Data, Line 203

Month	Feb.			Apr.			Jun.	
Station	01	02	03	01	02	03	01	02
Date	22	22	22	17	17	17	6	6
Time	1415	1310	1115	1510	1340	1200	1345	1355
Col. depth (m)	60	95	120	54	97	120	57	95
Volume (cc)	0.5	0.3	1.0	3.0	3.0	4.5	0.6	1.0
Biomass (mg/m ³)	23.06	13.25	16.77	71.10	72.63	52.94	32.56	23.18

Month	Aug.			Oct.			Dec.		
Station	01	02	03	01	02	03	01	02	03
Date	13	13	13	10	10	10	17	17	17
Time	0200	0330	0545	0510	0625	0755	0840	0715	0539
Col. depth (m)	60	80	110	50	100	100	52	93	107
Volume (cc)	3.0	8.5	7.0	3.5	4.5	4.0	4.0	5.0	0.5
Biomass (mg/m ³)	70.23	169.81	127.79	101.89	56.60	59.12	108.83	64.95	10.58

313 선 부유생물 조사표
Plankton Data, Line 313

Month	Feb.				Apr.				
Station	02	04	08	10	02	04	06	08	10
Date	22	22	22	22	17	17	17	17	16
Time	0945	0540	0035	2215	0910	0600	0350	1045	2140
Col. depth (m)	100	80	25	70	90	100	90	80	80
Volume (cc)	0.5	0.3	1.0	0.1	4.5	7.0	10.0	2.0	2.0
Biomass (mg/m ³)	17.30	14.15	59.19	1.80	69.18	83.02	133.12	40.09	55.82

Month	Jun.				Aug.				
Station	02	04	06	10	02	04	06	08	10
Date	6	6	6	7	13	13	13	13	13
Time	1800	2025	2245	0320	0630	1105	1420	1720	2025
Col. depth (m)	90	90	80	68	90	88	85	95	70
Volume (cc)	4.0	0.2	1.5	5.0	1.0	0.1	2.0	2.5	2.5
Biomass (mg/m ³)	71.28	6.29	24.37	95.28	14.68	0.71	34.79	39.40	53.46

Month	Oct.				Dec.				
Station	02	04	06	08	02	04	06	08	10
Date	10	10	10	10	16	16	16	16	16
Time	1010	1225	1500	1740	0257	0540	0745	1055	1410
Col. depth (m)	82	90	80	70	88	80	80	75	72
Volume (cc)	3.5	6.0	7.0	1.0	6.5	7.0	7.0	6.5	4.5
Biomass (mg/m ³)	59.09	125.79	82.55	26.06	95.79	95.13	77.04	102.35	62.01

314 선 부유생물 조사표

Plankton Data, Line 314

Month	Feb.					
Station	00	01	04	06	08	10
Date	13	16	16	16	21	21
Time	1240	0910	1235	1615	1440	1825
Col. depth (m)	150	120	100	100	95	68
Volume (cc)	0.5	3.5	1.0	0.1	0.2	2.5
Biomass (mg / m ³)	7.97	46.12	16.35	1.26	7.28	64.75

Month	Apr.					
Station	00	02	04	06	08	10
Date	13	14	14	16	16	16
Time	2310	0320	0635	0855	1310	1712
Col. depth (m)	160	110	100	110	90	80
Volume (cc)	7.0	4.0	9.0	6.0	4.0	2.0
Biomass (mg / m ³)	63.31	44.40	119.50	74.90	77.92	40.88

Month	Jun.						
Station	00	02	04	05	06	08	10
Date	10	10	9	9	9	9	9
Time	1250	0910	1300	0950	0800	0430	0105
Col. depth (m)	150	125	100	100	110	90	75
Volume (cc)	7.0	2.0	0.3	0.5	1.5	2.5	1.5
Biomass (mg / m ³)	67.95	18.62	8.18	13.21	16.01	37.74	31.88

Month	Aug.						
Station	00	02	04	06	07	08	10
Date	14	14	14	14	14	14	14
Time	2045	1635	1230	0820	0620	0415	0015
Col. depth (m)	140	125	100	98	100	95	80
Volume (cc)	0.5	10.0	6.0	8.0	13.0	10.5	9.0
Biomass (mg / m ³)	9.44	134.37	88.99	117.14	180.50	170.86	148.19

Month	Oct.				
Station	00	02	04	06	08
Date	13	13	13	11	11
Time	1520	1145	0805	0525	0125
Col. depth (m)	120	125	100	90	70
Volume (cc)	10.0	8.0	8.0	1.5	3.0
Biomass (mg/m ²)	105.35	96.63	99.37	23.76	56.60

Month	Dec.					
Station	00	02	04	06	08	10
Date	11	11	12	15	15	15
Time	1809	2213	0225	0503	0906	1313
Col. depth (m)	132	124	98	100	90	88
Volume (cc)	0.1	8.0	7.0	5.0	5.5	4.0
Biomass (mg/m ²)	0.48	76.61	75.10	57.23	67.09	57.92

서 해 부 유 생 물 조 사 성 적

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306 선 부유생물 조사표
Plankton Data, Line 306

Month	Feb.				Apr.		
Station	03	05	07	09	03	05	09
Date	8	8	8	8	8	8	8
Time	0325	1150	1455	1805	0800	1100	1700
Col. depth (m)	10	40	55	60	10	40	60
Volume (cc)	1.0	1.0	5.0	2.0	1.5	0.2	0.2
Biomass (mg/m ³)	44.0	31.4	97.3	67.1	283.0	23.6	10.5

Month	Jun.				Aug.			
Station	03	05	07	09	03	05	07	09
Date	9	9	9	9	16	16	16	16
Time	1240	1530	1820	2110	0715	1035	1355	1715
Col. depth (m)	10	40	60	60	10	40	40	50
Volume (cc)	4.0	4.5	2.0	2.3	0.1	3.5	0.3	2.0
Biomass (mg/m ³)	1559.8	314.5	545.0	66.0	188.7	110.1	39.3	18.9

Month	Oct.			
Station	03	05	07	09
Date	8	8	8	8
Time	0855	1150	1440	1830
Col. depth (m)	10	40	50	60
Volume (cc)	0.3	2.2	3.8	1.5
Biomass (mg/m ³)	75.5	105.3	99.4	27.4

307 선 부유생물 조사표
Plankton Data, Line 307

Month	Feb.				Apr.		
Station	03	05	07	09	03	05	07
Date	9	9	9	8	9	9	9
Time	0945	0635	0320	2405	0850	0640	0205
Col. depth (m)	30	50	50	60	30	30	50
Volume (cc)	0.3	5.0	5.5	7.0	0.3	0.2	0.5
Biomass (mg/m ³)	31.4	125.8	119.5	137.3	31.4	27.3	15.1

Month	Jun.				Aug.			
Station	03	05	07	09	03	05	07	09
Date	9	9	9	8	16	15	15	15
Time	0815	0415	0115	2215	0215	2155	1835	1515
Col.depth (m)	30	50	50	70	30	40	50	60
Volume (cc)	1.5	0.9	9.5	10.0	4.0	2.5	3.5	3.0
Biomass (mg/m ³)	84.9	37.7	252.0	220.1	251.6	62.9	128.3	41.9

Month	Oct.		
Station	05	07	09
Date	9	9	9
Time	0740	0420	0120
Col.depth (m)	50	50	60
Volume (cc)	1.1	6.0	1.7
Biomass (mg/m ³)	34.0	132.1	38.8

308 선 부유생물 조사표
Plankton Data, Line 308

Month	Feb.					
Station	01	02	03	05	07	09
Date	9	9	9	10	10	10
Time	1415	1555	1720	0740	1050	1405
Col.depth (m)	20	25	45	50	60	80
Volume (cc)	3.0	1.5	0.3	5.5	8.0	4.5
Biomass (mg/m ³)	298.7	83.1	14.0	195.0	235.8	70.8

Month	Apr.					
Station	01	02	03	05	07	09
Date	10	10	10	10	10	10
Time	0710	0845	1035	1330	1630	1930
Col.depth (m)	20	20	40	50	60	70
Volume (cc)	0.6	1.4	0.5	0.1	0.3	1.0
Biomass (mg/m ³)	31.4	78.6	18.9	8.8	10.5	22.5

Month	Jun .							Aug .						
Station	01	02	03	05	07	09		01	02	03	05	07	09	
Date	7	7	7	8	8	8		18	13	13	15	15	15	
Time	1750	1915	2040	0845	1135	1430		1810	1950	2140	0015	0345	0705	
Col.depth(m)	20	30	50	50	70	80		20	30	50	50	50	80	
Volume (cc)	2.2	0.5	2.8	1.5	3.5	0.8		3.0	1.7	2.0	2.2	5.0	4.0	
Biomass(mg/m ³)	204.4	104.8	109.4	28.9	107.8	10.2		141.5	73.4	40.3	52.8	150.9	82.5	

Month	Oct.						
Station	01	02	03	05	07	09	
Date	9	9	9	16	17	17	
Time	1515	1655	1850	1320	1125	1455	
Col.depth(m)	20	30	50	50	70	80	
Volume (cc)	1.3	0.9	1.8	2.8	4.0	1.2	
Biomass(mg/m ³)	110.1	37.7	49.1	88.1	53.9	94.3	

309 선 부유생물 조사표
Plankton Data, Line 309

Month	Feb.						
Station	01	02	03	05	07	09	
Date	11	11	11	11	11	10	
Time	0955	0815	0635	0330	0015	2100	
Col.depth(m)	25	45	50	65	65	80	
Volume (cc)	5.0	3.5	2.0	3.0	8.5	2.9	
Biomass(mg/m ³)	347.6	86.7	45.3	106.5	129.7	114.0	

Month	Apr.						
Station	01	02	03	05	07	09	
Date	11	11	11	11	11	11	
Time	1325	1155	1040	0745	0455	0150	
Col.depth(m)	20	40	50	60	60	80	
Volume (cc)	1.2	4.2	1.2	4.0	2.0	3.1	
Biomass(mg/m ³)	78.6	136.8	44.0	91.2	62.9	43.2	

Month	Jun.					
Station	01	02	03	05	07	09
Date	7	7	7	7	7	7
Time	1355	1220	1040	0740	1445	0135
Col.depth (m)	30	50	50	70	70	80
Volume (cc)	2.5	5.0	5.0	3.7	2.3	2.0
Biomass (mg/m ³)	83.9	104.4	106.9	116.8	50.3	86.5

Month	Aug.					
Station	01	02	03	05	07	09
Date	13	13	13	13	13	13
Time	1345	1210	1025	0705	0345	0715
Col.depth (m)	30	40	50	50	60	70
Volume (cc)	1.0	7.0	2.5	5.0	4.0	0.1
Biomass (mg/m ³)	73.4	133.4	62.9	120.5	125.8	188.7

Month	Oct.					
Station	01	02	03	05	07	09
Date	18	18	18	18	18	17
Time	1140	0950	0805	0425	0110	2150
Col.depth (m)	30	40	50	65	60	70
Volume (cc)	6.0	5.0	6.0	7.3	5.0	7.0
Biomass (mg/m ³)	304.0	201.3	138.4	145.2	146.8	233.6

310 선 부유생물 조사표
Plankton Data, Line 310

Month	Feb.				
Station	03	04	05	07	09
Date	12	12	12	12	12
Time	0830	0955	1130	1435	1749
Col.depth (m)	25	55	70	80	90
Volume (cc)	1.9	4.5	10.0	7.5	4.0
Biomass (mg/m ³)	231.7	87.0	98.6	110.1	34.9

Month	Apr.				
Station	03	04	05	07	09
Date	12	12	12	12	12
Time	0840	1010	1145	1448	1800
Col.depth(m)	20	50	60	70	80
Volume (cc)	0.3	1.2	1.5	2.0	2.8
Biomass(mg/m ³)	22.0	37.7	78.6	29.6	40.9

Month	Jun.				
Station	03	04	05	07	09
Date	6	6	6	6	6
Time	1030	1205	1340	1640	1940
Col.depth(m)	20	50	70	80	90
Volume (cc)	4.0	2.0	4.0	9.3	1.5
Biomass(mg/m ³)	456.0	100.6	134.8	153.9	14.7

Month	Aug.				
Station	03	04	05	07	09
Date	12	12	12	12	12
Time	0710	0850	1025	1340	1655
Col.depth(m)	30	50	70	80	80
Volume (cc)	5.0	8.5	4.5	5.0	19.0
Biomass(mg/m ³)	234.8	192.5	73.7	72.3	381.3

Month	Oct.				
Station	03	04	05	07	09
Date	18	18	18	18	19
Time	1555	1755	1940	2305	1225
Col.depth(m)	20	50	60	80	90
Volume (cc)	3.0	7.0	2.5	8.5	1.6
Biomass(mg/m ³)	204.4	157.2	47.2	204.4	20.5

311 선 부유생물 조사표

Plankton Data, Line 311

Month	Feb.				Apr.			
Station	04	05	07	09	04	05	07	09
Date	13	13	13	13	13	13	13	13
Time	0940	0800	0420	0110	1035	0850	0455	0145
Col.depth(m)	30	75	90	85	40	70	90	70
Volume (cc)	1.0	2.5	5.0	1.0	0.5	0.2	2.0	1.3
Biomass(mg/m ³)	37.7	19.3	62.9	14.8	15.3	6.3	30.0	27.0

Month	Jun.				Aug.			
Station	04	05	07	09	04	05	07	09
Date	5	5	5	5	12	12	11	11
Time	1025	0845	0535	0225	0155	0015	2045	1725
Col.depth(m)	30	70	90	80	30	70	90	80
Volume (cc)	2.8	7.5	7.0	10.0	0.2	1.0	3.0	2.5
Biomass(mg/m ³)	203.4	195.0	227.1	239.8	10.5	33.2	19.6	23.6

Month	Oct.				Dec.		
Station	04	05	07	09	04	05	07
Date	19	19	19	19	20	20	20
Time	2040	1852	1450	1135	2045	1010	1545
Col.depth(m)	30	70	80	80	30	54	75
Volume (cc)	80.0	5.5	1.1	7.0	0.2	2.0	1.0
Biomass(mg/m ³)	442.4	106.0	39.3	157.2	8.39	69.93	36.07

312선 부유생물 조사표
Plankton Data, Line 312

Month	Feb.					Apr.			
Station	02	03	05	07	09	02	03	05	07
Date	16	16	16	15	15	16	16	16	16
Time	0500	0325	0030	2050	1740	1230	1410	1740	2055
Col. depth (m)	85	70	90	90	85	80	70	90	80
Volume (cc)	1.0	1.5	2.0	1.0	1.0	0.3	2.0	0.7	6.0
Biomass (mg/m ³)	20.0	31.4	62.9	28.0	22.2	7.9	41.3	10.5	98.3

Month	Jun.					Aug.				
Station	02	03	05	07	09	02	03	05	07	09
Date	4	4	4	4	4	8	8	8	8	11
Time	0610	0745	1055	1445	1755	1120	1250	1600	1925	1055
Col. depth (m)	80	70	90	90	80	50	70	70	90	100
Volume (cc)	0.7	4.0	14.5	1.5	2.0	0.2	0.5	0.5	0.3	3.0
Biomass (mg/m ³)	9.4	80.9	283.0	16.8	52.9	12.6	19.8	10.8	11.9	42.1

Month	Oct.					Dec.			
Station	02	03	05	07	09	02	03	05	07
Date	21	21	21	20	20	17	17	17	17
Time	0630	0430	0055	2112	1725	1115	1229	1525	1750
Col. depth (m)	70	70	90	90	85	80	70	90	94
Volume (cc)	5.2	4.0	2.0	10.0	2.0	2.5	1.0	1.0	3.0
Biomass (mg/m ³)	107.8	85.4	31.4	157.2	27.4	51.89	28.75	18.17	33.47

해양조사연보 (정오표)

Volume 21

Errata

페이지	열	행	오	정
Page	Line	Column	Error	Correct
11	하 2	좌 2	COEANOGRAPHIC	OCEANOGRAPHIC
23	상 2	"	"	"
25	상 3		Lacation	Location
35	상 16	좌 2	12	13
36	상 15	좌 3	08:55	09:55
46	상 11	좌 3	10:15	11:15
53	하 12	좌 3	13:25	14:25
53	상 15	좌 3	11:00	13:00
70	상 16	좌 3	16:30	19:10
73	하 14	좌 3	13:31	34:31
74	상 5	우 1	BC	C
77	상 18	우 1	B	BC
78	하 13	좌 3	05:15	00:15
101	상 3	우 2	Clound	Cloud
102	상 12	좌 2	8.27	9.81
102	상 13	좌 2		8.27
104	상 7	좌 5		μg - at / L
104	하 8	우 1	B	BC
110	상 8	우 3	25	75
117	하 11	좌 3	19:40	09:40
121	상 6	우 3	PO ₂ - P	PO ₄ - P
147	하 6	우 4	0.37	6.37
147	하 12	우 1	3	B
166	상 8	좌 3	23.79	32.79
176	상 8	우 1	33.35	34.35
195	하 17	우 1 좌 6	No ₂ - N	SiO ₂ - Si
216	하 3	우 4	8.24	6.24
217	상 2	우 3	Water Tans .	Water Trans .
231	상 8	좌 3	35.29	32.29
235	하 7	좌 1	Darection	Direction
237	상 16	좌 4	47	4.7
242	하 4	우 3	5.49	0.49
280	상 2	우 1	007	307
288	하 3	좌 3 우 5	37.60 , 37.47	31.60 , 31.47
307	상 12	우 3		Water Trans .
350	상 7	우 4	%	%
475	상 11	좌 2	030	03

서기 1973년 8월 10일 인쇄

서기 1973년 8월 20일 발행

편집경
인쇄인 국 립 수 산 진 흥 원

(부산시동구범일동812번지)

인쇄처 아 주 사

전화 ㉠ 4411 · 4412 · 4413

